SEPTEMBER, 1960

EDUCATION

OUR EIGHTY-FIRST YEAR of PUBLICATION
VOLUME 81 . . . . . NUMBER 1

EDUCATION

Emmett A. Betts, Editor-in-Chief
C. B. Ulery, Managing Editor

EDITORIAL BOARD

Chairman, M. HUGHES MILLER, President, The Bobbs-Merrill Company, Inc.

ISMAEL RODRIGUEZ BOU, Univ. of Puerto Rico, Rio Piedras, P. R.
WILLIAM H. BRISTOW, Director, Bureau of Curriculum Research, New York, N. Y.
EDGAR DALE, Professor of Education, Ohio State Univ.
JOHN J. DEBOER, Editor, Elementary English, Univ. of Illinois
GEORGE DENEMARK, School of Education, Univ. of Wisconsin
CHARLES A. FORD, Vice-President, F. E. Compton Co., Chicago, Ill.
ELEANOR M. JOHNSON, Director, Elementary School Services, Wesleyan Univ.
JORDAN L. LARSON, Supt. of Schools, Mount Vernon, N. Y.
MARJORIE PALMER MAXHAM, Classroom Teacher, Braintree, Mass.
CHARLES D. NEAL, Director, Teacher Training, Southern Illinois Univ.
MARION REX TRABUE, Professor of Higher Education, Univ. of Kentucky
ALLAN M. WEST, Executive Secretary, Utah Education Association

ASSOCIATE EDITORS

SISTER MARY AMATORA, O. S. F., St. Francis College, Fort Wayne, Ind.
DONALD L. CLELAND, Univ. of Pittsburgh, Pittsburgh, Pa.
J. ALLEN FIGUREL, Univ. of Pittsburgh, Pittsburgh, Pa.
J. KENDALL HOGGARD, Director of Instruction, El Dorado, Ark.
JEROME LEAVITT, Professor of Education, Portland State College, Portland, Ore.
J. MURRAY LEE, Southern Illinois Univ., Carbondale, Ill.
JOHN U. MICHAELIS, Professor of Education, Univ. of California
LEON MONES, Asst. Superintendent, Board of Education, Newark, N. J.
GARRY CLEVELAND MYERS, Editor, Highlights for Children, Honesdale, Pa.
T. ERNEST NEWLAND, Professor of Education, Univ. of Illinois
RALPH J. OJEMANN, Univ. of Iowa, Iowa City, Iowa
MERVIN K. STRICKLER, JR., Federal Aviation Agency, Washington, D. C.
GUY WAGNER, Director, Curriculum Laboratory, Iowa State Teachers College
LORIN WHEELWRIGHT, Specialist, Music Education, Salt Lake City, Utah
Book Review Editor: WILLIAM P. SEARS, JR., School of Education, New York Univ.

Howard W. Sams, Publisher
Mal Parks, Jr., General Manager

Robert N. Rippy, Production Manager
William C. Heckler, Art Director
Patricia A. Tidd, Circulation Director
Constance S. McCawley, Assistant

THE BOBBS-MERRILL COMPANY, INC.
A SUBSIDIARY OF HOWARD W. SAMS & CO., INC.
Publishers • INDIANAPOLIS • NEW YORK

Member of
EDUCATIONAL PRESS ASSOCIATION OF AMERICA

ADDRESS ALL CORRESPONDENCE relating to circulation and editorial to EDUCATION, 1720 East 38th St., Indianapolis 6, Indiana. **Copyright, 1960 by the Bobbs-Merrill Company, Inc.**

EDUCATION for September, 1960, Vol. 81, No. 1. EDUCATION is published monthly except June, July and August by The Bobbs-Merrill Company, Inc. at 1720 East 38th Street, Indianapolis 6, Indiana. Second-class postage paid at Indianapolis, Ind. Subscription Rates: In U. S. A. and possessions, 1 year $5.00, 2 years $9.00, 3 years $12.00. Add 50¢ per year additional for all other countries. Single current issues 75¢ each; back issues $1.00 each. Microfilmed volumes of EDUCATION are available from University Microfilms, Inc.

EDUCATION

VOLUME 81, NUMBER 1 SEPTEMBER, 1960

CONTENTS

Feature Section

Child Development

Dorris May Lee, Guest Editor

What Are Our Children Saying? . . . . . *Dorris May Lee* 3
Learning To See Themselves . . . . . *Lillian L. Gore* 7
Learning One's Culture . . . . . *Hugh V. Perkins* 11
Pacing in the Patterns of Growth . . . . . *Lena Rexinger* 15
Developing Creativity in Children . . . . . *Robert C. Wilson* 19
Some Factors Affecting Learning . . . . . *Walter B. Waetjen* 24
Parent-Teacher Education and Child Development . . *R. N. Lowe* 28
School Interests in Later Childhood . *Sister Mary Amatora, O.S.F.* 32

Special Articles

The ABC's of Personality Evaluation *C. R. Meek and C. E. Skinner* 38
Recreation: An Attitude of Mind . . . . . *Carl E. Willgoose* 42
Relation of Vision and Reading . . . *Sister M. Bernetta, O.P.* 45
A Community Reading Center: Ten Years Later . *Walter B. Barbe* 48
Remedial Reading and Private Practice . . . . *William C. Daly* 52
Let's Challenge the Gifted Students . . . . *Eleanor M. Johnson* 56
Aviation Education Moves Ahead . . . . . *Evan Evans* 58

Monthly Departments

Leaders in Education XXVII: James R. Killian, Jr. 60
What Schools Are Doing—Individualizing Instruction *Guy Wagner* 61
Viewpoints—What Does the World Need?
(Part I) . . . . . *Earl H. Hanson* 62
The Bulletin Board 63
Book Reviews . . . . . *William P. Sears, Jr.* 64

Devoted to the Science, Art, Philosophy, and Literature of Education

Coming in the October EDUCATION

Featuring the subject of "Inventories and Tests," next month's EDUCATION will constitute a forum in which the following outstanding authorities will discuss a number of critical questions about the use of tests in education:

Dr. *Warren G. Findley*, Assistant Superintendent for Pupil Personnel Services, Board of Education, Atlanta, Georgia

Dr. *Raymond Gerberich*, Director, Bureau of Educational Research and Service, University of Connecticut, Storrs, Connecticut

Dr. *J. Thomas Hastings*, Director, Unit on Evaluation, College of Education, University of Illinois, Urbana, Illinois

Dr. *Robert D. North*, Educational Records Bureau, New York, New York

Dr. *J. Francis Rummel*, Director, Oregon Cooperative Testing Services, University of Oregon, Eugene, Oregon

Dr. *J. Wayne Wrightstone*, Bureau of Educational Research, New York City Board of Education, Brooklyn, New York

Guest editor, *Robert L. Ebel*, Vice-President of Educational Testing Service, Princeton, New Jersey, has formulated the soul-searching and, in some cases, controversial, questions, which our panel of experts will attempt to answer. Among these questions are:

1. Is the current trend toward increased testing in education desirable?
2. Is the widespread use of objective tests educationally constructive?
3. What is the proper role of intelligence testing in education?
4. Should a local school system organize its own local testing program and limit its participation in wide-scale testing programs?
5. Under what conditions should test scores be reported to students and parents?
6. Should scores on standardized tests be used to judge the effectiveness of a teacher or an educational program?

And in the months ahead, you'll find issues devoted to these other important areas: Gifted Children, Guidance, Juvenile Delinquency, The Slow Learner, Language Arts, Music Education, and Reading.

To enter a new subscription, or to renew or extend your present subscription, simply fill in the coupon below and mail today. (NOTE: To determine your subscription expiration date, simply refer to the extreme left-hand side of the bottom line of your address plate. Example: SEP 60 means your subscription expires with the September, 1960, issue, etc.)

960

EDUCATION, 1720 E. 38th St., Indianapolis 6, Indiana

Please enter my subscription order for the following term:

☐ **3 years, $12.00** ☐ **2 years, $9.00** ☐ **1 year, $5.00**

(Please add 50¢ per year for foreign countries)

☐ **Remittance enclosed** ☐ **Invoice me** ☐ **Extend present subscription**

Name.....**Title**.....

Affiliation.....

Address.....

City.....**Zone**.....**State**.....

What Are Our Children Saying?

DORRIS MAY LEE
Professor of Education, Portland State College
Portland, Oregon

WORKING effectively with children is, essentially, a matter of communication. Whether we be parents, teachers, or leaders of youth groups, our success depends on our ability to communicate.

Communication, we continually hear, is a two-way process. Obviously, this is true. If the sender does not send in such a manner that the receiver may comprehend and understand, or if the receiver is unable to comprehend and interpret what the sender transmits, it is perfectly clear that there has been no communication.

Most of the emphasis in the communicative process usually is placed on the sender—in this case, on the teacher or the parent—and on the improvement of his sending, so that children may receive better. In this paper, we are going to reverse the process; we are going to consider how the adult can improve his receiving skill, so that he may better understand the child, i.e., the sender.

On the surface, this task looks easy. But is it? Do we get all, or even most, of the messages the child sends out? A good estimate is that, in general, we are fortunate if we receive 25 per cent of the child's messages. No wonder we have difficulty working as effectively with children as we would like!

What Do Children Say?

What kinds of things do children try to tell us? What prevents us from receiving these messages? Let us consider the kinds of communication which seem to be the most difficult.

One thing that children try to tell us is how their world looks to them. They try to tell us how they feel about their world, how they feel about us, and, even more important, how they feel about themselves. They tell us about their problems and difficulties. They send out calls for help and assistance.

Yet, we must remember, children are not very widely experienced in communication. Too often they have learned to be a little, or more than a little, fearful of how their messages will be received. Let us take just one part of the child's world, the classroom, and see how it might look to some pupils.

Bob

Seemingly Bob had worked at cross-purposes all morning. Actually, he accomplished quite a bit if we honestly evaluate his activity, but he never did what he was "supposed to do." He did his arithmetic hurriedly during reading class. Then he quickly went to work on his project, moving all over the room to collect his materials and equipment, while the other pupils were either finishing their arithmetic or reading quietly. At the teacher's remonstrance, Bob answered, "I need to do this now."

By the time the other students were ready for activity, Bob had buried him-

self in a book, oblivious to the world. When interrupted by his group members to come and help, Bob joined them reluctantly. However, he soon left them with a surly, "Oh, do it your own way!"

A few moments later, the teacher asked Bob to sit up in his seat and to put his feet under the desk instead of out in the aisle. The boy flared, "Why the heck should I?" Then he got up, "signed out" on the chalkboard, and left the room angrily.

What had Bob been saying about his world and his feelings? What request for help had he been sending?

Bruce

Now let us call attention to another boy in class. When it was time for arithmetic class, Bruce, as usual, was well organized, ready to go to work. He listened with obviously rapt attention. His hand went up at every opportunity. When it was time to start work, Bruce began immediately, but every few moments he came to the teacher to ask, "Is this right? Is this the way to do this problem?"

Reassurance that he was on the right track and injunctions to go ahead and finish by himself were quite ineffective. Bruce's requests for reassurance continued. What was this lad saying about his world and his feelings? For what help was he really asking?

Paul

Over in the corner sat Paul, a boy who is usually so quiet that his presence in the classroom often is forgotten. At first, Paul seemed to be working well. He had a good start, for he began copying his problems right away.

As we watched Paul longer, however, we saw that he did not really seem to be getting anywhere. He sat almost motionless for a long time. He fiddled with his pencil. He drew over the numbers in his problems. Mostly, however, he just sat and looked at his paper. What was Paul saying about his world and his feelings? For what help was he asking?

What Can We Hear?

Now let us see if we can piece together some clues to the messages that these three boys sent. One thing is obvious: all of the messages were indirect and obscure. Children's messages always need to be deciphered, and, often, the code is an unfamiliar one.

Occasionally we need to call in experts to help us "break" the code. Even with expert assistance, the task is not easy. Nevertheless, familiarity with the more common codes will enable us to interpret many messages or, at least, will provide us with clues to meanings which can be verified in other ways.

Another factor immediately evident is that many of our clues to understanding are not words at all. Rather they take the form of behavior. Inasmuch as all thirty-five children in the classroom are behaving in one way or another, it obviously is a problem to decide whose behavior we should observe and when it is important to observe that behavior. Using the principles of psychology, let us see how well we can decipher the messages that Bob, Bruce, and Paul tried to send.

What Was Bob Saying?

What did Bob really say by his behavior? Why was he always doing what

he was "not supposed to be doing"? Why could he not get along with the members of his work group? What was behind his angry retort to the teacher's simple request?

There are a number of clues in Bob's behavior. In order to be sure that we are putting the right clues together, we need to check them in other situations. Nevertheless, the clues seem to point fairly consistently in one direction: Bob resents being told what to do and when to do it. He accepted the necessity of doing his schoolwork only on the basis of his doing it at his own time. He was willing to work with the group only so long as the group members were willing to do things his way.

The climax came when Bob could not even sit the way he wanted to sit. In another situation, Bob might readily have agreed that feet in the aisle constituted an unnecessary hazard. At the moment, however, he could not consider that possibility—he could see only that the teacher's request was the last straw in being "bossed around." So Bob said, in the only way he could at the moment, "I'm not going to take one more bit of bossing!"

What Was Bruce Saying?

The clues which Bruce gave us were numerous and consistent. He repeated over and over by both words and actions, "I'm trying as hard as I can to do just what you want me to do, but I'm afraid that I'm not succeeding. I don't think you like me very well, for you always tell me to go to my seat. If I can't get your real approval, then I'm sunk. I don't know what to try next."

When we have broken the code and read this much, another question is raised: Why does Bruce need our approval so badly—so much more than most children?

Our "code book"—child psychology—can help us. It tells us that, when children have not been able to gain respect and appreciation for what they are, just as they are, they may try to gain it by being what they think others want them to be.

This type of behavior is useful as far as the social amenities are concerned. When it is carried so far as to cause the child to lose respect for the person he is, because he does not feel that he can get approval for this self, the problem becomes serious.

Children, who themselves are clever at reading clues, sometimes are able to deny their own individuality and to remake themselves into persons who depend for every decision on the wishes of others. Such people often gain strong acceptance, especially from teachers who have difficulty accepting children who do not follow the "approved pattern."

A busy teacher may appreciate these submissive children, because they always do what she wants them to do and because they "never cause a minute's trouble." When this is what we find ourselves saying about him or, more often, about her, we may discover a clue to ourselves in understanding a child.

There are other children, like Bruce, who try to adjust themselves thusly, but who do not manage the adjustment well. They succeed only in becoming nuisances, thereby annoying the teacher. Noting the teacher's annoyance, these children strive all the harder, in the only way they know how, to gain the teacher's approval. As a result, they become even more annoying.

If we have read Bruce's message correctly, he seems to be saying: "I need to know for sure that you like me, that you think I'm really a worth-while person just as I am. It will take a lot of convincing on your part, because I will be afraid to accept your usual methods of approval. I'm afraid you don't really mean it when you give me your approval. I've been anxious about this matter for so long that I don't dare to believe you."

What Was Paul Saying?

Now let us try to read the message Paul tried to transmit. What did his quietness say? Why did he simply sit at his desk, going through the motions of working? Our "code book" will tell us that Paul has a most serious problem. When a child ceases to do much of anything other than make token gestures, calculated to keep the teacher off his neck, he needs lots of help and fast.

Before we can understand why Paul is as he is, we need much more information about him. Quite probably, Paul is one of those children for whom we will need to bring in experts to help us break the code.

Observation Warnings

We have attempted to examine what three boys were saying about themselves, their world as they saw it, and their feelings about both. By considering the "whys" of their words and actions, certain behavior clues have been identified and listed by workers in the field of child psychology.[1]

These clues can be most helpful, but they are not final answers. The value of clues is that they give us a starting place from which we can begin to check out a problem. Does the child's behavior occur frequently, or just once in a while? In what kinds of situations does it occur? Does it occur on the playground as well as in the classroom, at home as well as at school? What other things might the clues suggest?

One of the main advantages of using clues in our efforts to understand children better is that clues are obtainable in the simplest possible way—through observation. Anyone working with children has the opportunity to watch them. The only thing new is that the observation may have a new purpose. Hence, the observer may see much more than she ever saw before.

Again we must heed a warning. We must always know that our interpretations may be wrong. It is helpful, on occasion, to look deliberately to see if we can prove our first hunch wrong. We must always check our guesses with other people and, if possible, with more objective means.

Most important of all, we must believe that observation can be an indispensable tool if we work carefully and cautiously; if we look with empathy and understanding; if we try to discover rather than to make judgments; if we try to help rather than to condemn.

What are our children saying?

1. A number of such lists of clues have been summarized and discussed in J. Murray Lee and Dorris May Lee, *The Child and His Development* (New York: Appleton-Century-Crofts, 1958), Chapter 10.

Learning To See Themselves

LILLIAN L. GORE
Specialist, Early Elementary Education
U. S. Office of Education, Washington 25, D. C.

FIFTY YEARS or more of emphasis on child study are being brought to bear on education today. Many teachers are gaining insights into the perceptions and behavior of the children they teach. This is important, because those who guide and teach need to understand how the child perceives the situations he faces and how he views himself, whether realistically and positively or defensively and negatively.

It is possible for a teacher to gain these insights as she collects and analyzes information about a child over a period of time. The process may include keeping anecdotes, which describe what the child says and does; keeping samples of the child's work, such as his stories; studying the school records; and holding conferences with parents and others who know the child. Such information then can be related to scientific principles about the child's behavior and development and some insight can be gained as to how situations appear to the child.

Since the self-concept indicates the kinds of tasks an individual is willing and likely to "try for"—what he perceives himself as being able to do and what he values—an estimate by his teacher of this self-image should result favorably for the child.

What is meant here by "self-concept" is the persistent way in which a person has learned to perceive himself. When presented with a task, he may respond, "I can't do that." He thereby accepts or rejects a possible line of action according to its consistency with his self-image. He may have learned to associate certain characteristics with himself, such as being attractive or homely, liked or disliked, adequate or poor in reading or arithmetic, and so on.

The self-concept seems to have a controlling effect on the child's behavior. Lecky pointed out that the child resists learning what is inconsistent with his way of seeing himself and learns what is consistent (2).

What does the teacher consider in the child's evolving self-concept? Three approaches, though they are not intended to be exhausive, will be examined: (*a*) the individual's feelings as to whether he is valued and accepted; (*b*) his peer relationships; and (*c*) the achievements which he believes possible for himself.

Feeling of Security

The feelings, which the young child develops as a result of the ways his needs are met in infancy, seem to orient him to his world. If he receives food, warmth, and support promptly and consistently, he learns that he is living in a dependable environment. He thus gains confidence and surefootedness in moving into his world—a world that appears to him to esteem him and to respond to him in a personal way.

Such a child, Prescott (3, p. 359) states, is able to cope with failure and disappointments. "For example . . . the failure does not cut so deep as to make him doubt his basic worth. Knowing that he is loved, he can be easily reassured and encouraged to try again."

By way of contrast, the insecure child, after failure, becomes hesitant to try again. The child's anchorage then becomes a matter of his early relationships with his environment, whether it encourages or discourages him, values or rejects him. These experiences influence the selfhood that the child develops.

Peer Relationships

Teachers know that the child who is secure in his emotional relationships forms close relationships with other children. He tends to have friends, and he tends to be accorded roles considered important by the group. Such a position in one's group enhances the child's self-concept and makes possible many valuable learning opportunities in working with his peers. He, in assuming peer-group roles, is learning leadership skills, the concept of teamwork, "and a sense of personal adequacy based on sure belongingness." (3, p. 278).

This feeling of adequacy and belongingness is important to both the child and his group. One who feels he belongs is "likely to be trustworthy and can be counted upon in the clinches." (1, p. 19) He has an investment in the group. Those who feel unwanted are not likely to assume any responsibility.

Social Growth

The very young child plays beside another child. He is unable to risk more. If his development goes normally, he later learns to interact with others; then he learns a give-and-take relationship. He shares, yet retains possession of his own things; he respects another's point of view, yet defends his own without threat to either. Through these experiences he builds his own way of looking upon himself; of knowing what he feels; of finding out how he gets satisfactions; and of discovering how to solve his problems.

The following anecdote illustrates the behavior of a first-grade child who is beginning to develop leadership:

Frances, in passing by a child's desk, stopped and began watching him write some numbers. The child stopped, looked at a figure wrongly written, and started over again. Frances, pointing to the eraser, said, "I use mine when I make a mistake." The child followed the suggestion and Frances returned to her work.

Building Adequacy

A third approach to understanding the child's self-concept is observing what he is willing or eager to attempt. If he withdraws or avoids a task, one looks for the possible meaning to him of his previous efforts in this activity or considers what the value of the activity might be to him in terms of his needs and goals.

One observes that the child's approach to tasks, when he perceives himself accurately and positively, seems to be one of selecting those things which are appropriate and satisfying. He likewise is able to anticipate without threat some undertakings in the future.

An illustration from a teacher's record showed that before John entered the

first grade he sought experiences with books through make-believe reading; he asked about words on signs, labels, and the like; he developed an interest in science and worked on experiments with his father; and he developed other interests. John seemed to feel able and confident when he reached the first grade. His teacher noted that he accepted classroom responsibilities and made steady progress in his work; moreover, he was liked by the children. This child apparently viewed himself both realistically and positively.

In our approach to studying a child, factors listed by Combs (1, p. 13) are useful in observing and summarizing information about them:

1. *The nature of the physical organism which the child possesses.* For example,[1] is he physically attractive? Does he possess abilities for which he is rewarded? Does he possess physical skills which are valued by the group or skills which are needed for defending himself?

2. *The length of time he has lived.* What stage of development is the child experiencing? Is he able to accomplish the tasks usually expected of his age group? Does he receive the support and nurture at one age level which enable him to accomplish those tasks and to move into the next stage with some confidence?

3. *The opportunities he has had to perceive in the past.* What opportunities has the child had for rich sensory experiences; for satisfying relationships with others? What opportunities has he had for learning those things which are significant to him?

4. *The operation of his current need.* Are his strengths and needs noted and used as data for teaching and guidance? What are the situations which seem to meet certain needs? Who are the people involved?

5. *The goals and values the individual holds.* Do the child's values appear to be relatively consistent? Are his goals realistic for him? How does he express the values of his subculture (family, community, geograpical region)?

6. *The experience of threat.* Do the expectations placed on the child seem to threaten or enhance his self-concept? Is the child secure and confident enough to handle reasonable threat?

7. *The self-concept. People perceive what is consistent with their image.* Does the child see himself as valued and worthy in his own right and as able to cope with reasonable expectations placed upon him?

The following data shared by parents of a young child suggest some of the early influences which affected her development. The mother said in response to a question about the language experiences the child had before she entered school:

"I talked to Mary from the time she was a baby. In fact, I sang a lullaby to her the first hour she was brought to me in the hospital. We have shared music, poetry, and stories with her all of her life. We never talked baby talk, but we have made it a point to include the children in the conversation at dinner and at other times."

Such glimpses, along with other information, have value to teachers in pointing to children who are likely to have a favorable orientation to their world. One might wonder if this child

1. The analyses of these factors for this discussion are the writer's.

grew to feel that she had a place and could handle herself in most of the situations which confronted her.

The Teacher's Role

What is the teacher's role in helping children build self-images which promote their growth and learning?

Another example of a teacher's record suggests some leads. An eleven-year-old boy, one of four children in the family of a tenant farmer, had a school history of learning and behavior difficulties. The following excerpts from the record indicate the teacher's insights:

"Bill's home relations seem to be reasonably supporting. His physical needs are met. He wears good clothes. Is given money to spend for food he likes. Mother told with pride his age when he walked and talked.

"Bill seems to be close to his mother. He says, 'We are going to Church.' Repeats mother's sayings often. Mother helps with his spelling. Prepares his lunch as he likes it. Bill had money and received presents at Christmas. He and mother discuss neighborhood happenings such as the square dances. Said little about his father except once when he went deer hunting with him."

The teacher valued Bill. She recorded, "He is worth studying." She said to him in regard to previous years, "That's all right. This is this year now. I trust you. . . ."

The teacher was consistent in her requirements, but responsive to Bill as a person. "I told him I thought he could walk down town during the lunch hour."

When Bill was ready to work with others, a group was formed in response to his request, "Let Wesley, Jimmie, and me make a map." Again he indicated that he had learned how to get help and the kind of a person who could help him: "Jane is good in arithmetic, and she is quiet. Let her help me." Bill's teacher seemed to maintain a climate in which this boy was able to appraise and accept himself, to relate positively to some of his peers, and to approach school tasks with some increased assurance.

It is hoped that teachers and parents might assist children in building positive and realistic images of themselves by valuing them, by identifying with them their assets and needs, and by helping them build upon their assets. They might help youngsters set further realistic goals and might give genuine approval for achievement, irrespective of the difficulty of the goals as compared with those of other children. Educators might broaden and deepen the curriculum so that many opportunities for development are open to every child.

REFERENCES

1. Combs, Arthur W. "Personality Theory and Its Implications for Curriculum," *Learning More about Learning* (Washington, D. C.: Association for Supervision and Curriculum Development, National Education Association, 1959).
2. Lecky, Prescott. *Self-Consistency* (New York: Island Press, 1945), p. 103.
3. Prescott, Daniel A. *The Child in the Educative Process* (New York: McGraw-Hill Book Co., Inc., 1957).

Learning One's Culture

HUGH V. PERKINS
Professor of Education, Institute of Child Study
College of Education, University of Maryland
College Park, Maryland

A KNOWLEDGE of the principles of human growth and development is an important aid to parents, teachers, recreation leaders, and religious workers as they help each young person to achieve optimum realization of his potentialities and to grow toward satisfying, effective adulthood.

A knowledge of the sequence of developmental changes and characteristic behavior patterns for each level provides valuable clues for assessing behavior and development, but clues alone are not enough. Understanding and helping a particular child require that we obtain complete information concerning his physical status, his environment (including family, school, community, and cultural background), and the effects of these factors on his personality and adjustment.

Many Subcultures

Each individual's growth and development take place in a complex of social and cultural milieus. Through the processes of socialization, the child learns not only the customs, ways, beliefs, and values of the larger culture, but also specific behaviors. Moreover, he internalizes particular beliefs and values appropriate to his multiple memberships in subcultures of geographic region, urban-rural, social class, ethnic, race, religious, sex, and age groups.

The role expectations and patterns of these subcultures form a general cultural mosaic which, like the kaleidoscope, is perceived differently as ever changing patterns of color and form. A child's behavior and development take on newer and fuller meaning when they are studied and assessed in relation to the cultural contexts which shape them.

Culture Is Learned from People

Relatively few learned patterns of behavior and belief are gained from books. Primarily, the institutions established by society—the family, school, peer group, church, and community—are charged with preserving and passing on to each oncoming generation the ways and ideals of the culture. These institutions are seen by the child as people who hold some significance or authority in his life: mother, father, agemate, priest, or scoutmaster.

The child identifies himself fully, or in part, with one or more of these significant people in his life. He learns ways of behaving, appropriate to his culture, by imitating these people and others. Freddie has often watched his father tinker with the family car, and as he works on his car—soapbox model—familiar "cuss" words resound from the garage as a troublesome gasket just won't fit into place.

Being accepted as a full-fledged mem-

ber of a family, classroom, peer group, church, or scout troop is also an important way one learns his culture. Each group has its own culture—its own codes, standards, and expectations.

The behaviors, beliefs, and attitudes, which the child adopts in conformity with the group standards, become his badge of membership and identification with that group. Billy's baseball skills quickly won him an esteemed place in his peer group. Nevertheless he found himself being left out of their games when he continued his rough play and bossiness in spite of the protests of the other boys.

More remote persons who communicate cultural ideas and values to children and youth are those who appear as characters or performers in mass media, films, comics, radio, and TV. Research studies show that films and TV presentations can change children's attitudes toward ethnic groups; influence their concepts of role expectations; and increase the intensity of emotions experienced. They show, too, that the average child prefers watching TV to reading books and other leisure-time activities (1).

The total effect of TV on the growth and development of children, as yet, has not been fully evaluated. Through TV and other mass media, children are exposed to the whole range of models of behavior and cultural patterns which exist in America, and some of these do influence their language, dress, and behavior. Wyatt Earps and Kookies are found in every neighborhood.

In assessing the effects of TV on children's socialization, one cannot help speculating on the effects of so many programs offering escape and entertainment with the corresponding loss of active self-participation in hobbies, reading, discussion, and other experiences which would increase learning and promote development.

Human Relationships Important

If culture is learned from people, it is quite probable that the quality of human relationships between the young person and his parent, teacher, or other cultural agent is of crucial importance in determining how much he learns. As with other types of learning, one learns his culture more readily and well when the human relationships and social-emotional climate are characterized by acceptance and mutual respect.

It is quite normal for some differences and conflicts to arise between children and the most understanding parents and teachers, especially in situations involving socialization. These differences quickly resolve themselves if the adult and the child accept and mutually respect each other. Without mutual acceptance and respect the child is likely to rebel rather than to accept and adjust to socialization demands. Such a pattern can create difficult adjustment problems inimical to his growth and development.

School as Socializer

Schools in contemporary life are being given increased responsibility for communicating and teaching cultural values and behaviors consonant with these values. Today's families, especially in urban and suburban communities, have abdicated many of their traditional roles and responsibilities in children's socialization. Families tend to fragment, as centrifugal forces pull members to-

ward a variety of cultural influences: peer group, mass media, community activities, and associations.

The school faces perplexing problems as it accepts its increased role and responsibilities for children's socialization. One problem identified by Davis (1) and others is that many of the goals, values, and curricula stressed by teachers, who are overwhelmingly middle class, are completely foreign and have little meaning for the vast majority of children in our public schools who come from lower class and minority groups.

Miss Sherrill was conscientious in her efforts to help students improve their skills for speaking and writing correct grammatical English. Some students did improve their communication skills, but most of the children from across the tracks seemed to make little effort to change their slang and ungrammatical patterns of speech.

Of Joe she asked, "Don't you want to make a good impression on people?"

Joe replied, "Teacher, if I talked that way at home, I'd have to pick myself up off the floor!"

Revitalized programs in mathematics, science, and foreign languages, as well as numerous programs for the gifted, have placed additional pressures on middle-class and college-bound youth. Intellectual attainment is once more a sought-after goal and value in our culture. Some people may wonder whether the school's role of communicating the culture through citizenship training and the social studies has diminished as the result of these programs.

Cultural Conflicts

Among the most potent yet subtle forces which complicate and limit growth and development of young people are the conflicts and inconsistencies present in contemporary culture. Our democratic way of life affirms the inherent value of the individual and grants him freedom to develop his unique and socially useful capacities and talents.

Yet the press of the group for conformity and the individual's blind acceptance of group standards in place of experience-tested values result in a loss of uniqueness and freedom and in increased confusion regarding ethical issues (3, 4).

Another confusion which seems to have gripped our culture is the acceptance of symbols in place of the real thing. Henry's father frequently questions him about his school marks and often checks on him at school. Although Henry has learned that marks are important, seldom has his father asked, or discussed with Henry, what he has learned at school.

A further reflection of this confusion is seen in the mad rush of youth, egged on by parents, to be accepted for admission to *the* college or university. Presumably no other institution could possibly bring to full maturity and bloom his undoubted talents.

Finally, there is the conflict between increasing specialization and the need for broad generalized knowledge and understanding. Specialization and increasing complexity of organization are concomitants of industrialization and technological progress. Such a trend makes it possible for nearly everyone to pose as an expert in something, but it also may limit one's full development and use of his various capacities and talents.

Fortunately, the grade teacher who teaches all the subjects is still with us,

but she is rapidly becoming overshadowed by specialists in guidance, reading, speech, music, pupil personnel, and a host of other areas—with the end not yet in sight.

This conflict regarding specialization has tended to turn us into a nation of spectators. We seldom assume the active-participant roles played by our parents and grandparents. We feel safer watching the professionals play, but we could gain fuller benefits by developing our own modest skills in playing a game with our child or other adults.

Effects on Individuals Vary

A major variable affecting the growth and development of children and youth is the differential impact which culture, in its many manifestations, has on individuals, each with his own unique organism and capacities for response. For some children, cultural learnings are accepted and learned quickly and easily. For other children, they are accepted and learned only after a long hard struggle which may produce scars on both children and parents.

Philip is extremely active, has a low threshold of frustration tolerance, and has strong drives for status and self-esteem. His strong self-needs are slowly reconciled and redirected by the steady cultural pressures exerted by parents and teachers. Nevertheless, for Phillip, cultural demands will remain something he contends with, rather than limitations he adjusts to or accepts.

Florence's self-needs, on the other hand, seem to blend with the demands and limitations of the culture, so that her socialization proceeds smoothly.

Though quite different, Philip and Florence are both well within the broad range of normal growth and development. Each, in his own way, will make important contributions to society. Society has need of them both. Wise teachers and parents, by being sensitive to the differences in children, can modify and adjust cultural demands in ways which make socialization a positive factor in their growth and development.

REFERENCES

1. Davis, Allison. *Social Class Influences on Learning* (Cambridge, Mass.: Harvard University Press, 1948).
2. Martin, W. E., and Stendler, C. B. *Child Behavior and Development* (New York: Harcourt, Brace and Co., 1959), pp. 424-435.
3. Riesman, David. *The Lonely Crowd* (New Haven Conn.: Yale University Press, 1950).
4. Whyte, William H. *The Organization Man* (Graden City, N. Y.: Doubleday Anchor Books, 1957).

It is customary, but ink it is a mistake, to speak of happy childhood. Children are oft overanxious and acutely sensitive. Man ought to be man and maste his fate; but children are at the mercy of those around them.

—John Lubbock, *The Pleasures of Life*

Pacing in the Patterns of Growth

LENA REXINGER
Associate Professor of Elementary Education
Arkansas Polytechnic College
Russellville, Arkansas

GLANCING into a classroom, I see Kenneth sitting on the floor with a set of directions before him. Strewn about him are copper wire, battery cells, and a doorbell which does not ring at present. Soon it will ring, however, and Kenneth will have solved the problem set by himself and the group—the problem of providing a proper alarm for various occasions.

My eye travels now to Stephen, who is enjoying his first meeting with Gelett Burgess—a meeting in which Stephen is reading "The Purple Cow" and other familiar verses for himself. Soon he will discover the unfamiliar verses and will experience further enjoyment.

Next I see Sarah whose brother is hospitalized in another city. She has chosen this time to write to him.

Some time later in the day, I pass the doorway of this classroom again. Now the children are working at tables—some of them alone; others in small groups. What is going on now, I wonder? A beckoning nod and a smile from the teacher make me bold. So I go in, walk among the children, and decide that it must be arithmetic time.

Kenneth is practicing long division. Stephen, forsaking the purple cow for the purple language of cowboys, is working through to an understanding of perimeter and area in relation to the vast holdings of Bar Z Ranch. Sarah is working alone, also engrossed in mastering her long division. There are other busy children, too—some acquainting themselves with latitude and longitude; others, with addition with carrying; and still others, with subtraction with borrowing. Around a large table, the teacher and five children are reducing improper fractions to whole numbers. As I move toward the door, Sarah waves me on my way.

What is it that I have seen? I have seen children working out their own problems. I have seen them helping to solve the problems of others. In both cases, I have seen each child proceeding according to his own pace and pattern of growth. What I have seen is called pacing.

Individual Differences

We know that each child sets his own pace for learning to walk. The pattern varies with each individual. One child may crawl for many weeks, strengthening his leg muscles and his back muscles so they can hold him upright. Another may crawl for only a short time or, perhaps not at all. Instead, he may demand the reassuring and steadying support of an adult, as he makes his way around the room. Eventually, the time comes when he is willing to negotiate the space alone.

Research tells us that the peak age

for the young child to acquire language skill is between the second and third birthdays. Nevertheless, some children express themselves very well before this time, and others come to do so at various periods within the year. Some of our most gifted writers attest to the fact that they talked at an age much later than the commonly accepted one.

Readiness

Despite these facts, it is not commonly recognized that the differences of pace and pattern extend beyond babyhood through the growing years of childhood and youth. Nor is it commonly recognized that the differences include variations other than those in physical development.

It is true that, for some time, there has been an attempt on the part of many teachers to present various learning activities to children when the children are judged to be "ready." However, readiness too often has become a step on the way to some other end, rather than one of the many times of reorganizing and strengthening the child's accumulated learnings.

In addition, the "building of readiness" too often has become a stereotyped series of activities instigated by the teacher. The child has too little opportunity to move himself along the path of selecting his own learnings and making them a part of his total self.

Pacing

Perhaps, on the basis of what we know about physical growth, the inadequacy of our concept of readiness, and some research in the field of individualized reading, we now should evidence that faith we say we have in the individual child. Perhaps we now should free him to set his own pace in learning. Perhaps, as teachers, we should allow ourselves to be led rather than followed.

To do this, we must develop sensitivity to each child; we must develop keen insights into his feelings and behavior—insights that will help us to recognize his patterns of growth, that will help us to nourish and aid him as he sets his own pace.

When the child paces his own learning, he does so in full awareness of its meaning and worth, as he sees it in relation to himself. There are no "great gaps in the difficulty of a series of related activities" which force him to set up defenses or to undertake unfruitful methods of work in order to cope with a situation. He moves forward at a rate that permits him to integrate these new learnings into his total personality.

Pacing does not mean that the child will "do as he pleases." Rather, it means that he will actively work to further his own growth along paths that are meaningful to him. He will have the support and assistance of an adult who believes in him and trusts him.

Research has long pointed to the fact that children who are spared the "arithmetic period," but who make use of numbers in their daily school living, gain both knowledge and skill in the fundamental processes. Furthermore, there is evidence that they learn the arithmetic which is commonly associated with a particular age level if they are permitted to move themselves forward.

Similar results have been shown by groups using an individualized-reading approach. In some cases, there has been an increase in the number of books read.

In other cases, gains on standardized tests have been so much greater than anticipated that the test did not show the highest level that could have been attained! These results have been coupled with increased satisfaction and joy in reading—two elements necessary for children to continue to read as they move through school and into adult life.

Methods and Materials

Just as we must become more insightful, so also must we become more resourceful with both methods and materials.

In many cases, the child will find the best method for teaching himself. At other times, a suggestion from the teacher will help him over a difficulty.

Outlining is an important skill to develop when one is preparing a report. Perhaps the child will need help in learning to work from major headings through to subtopics.

Or, erratic as our language is, there are some rules that will be helpful in spelling. These rules might well be pointed out to the child when he has sufficient background to use them effectively.

As teachers, we will need to know many, many methods—all consistent with what we now know. Furthermore, we will continue to learn about both the learning process and children.

The method should be looked upon as an approach to the solution of a problem, rather than as a device, an end in itself, or a solution to all troubles.

Materials must be abundant in both kind and number—even more abundant than they are in many of our classrooms today. They must be chosen with two things in mind—the needs which all children have in common, and, what is often neglected, the needs of individuals who make up a particular group.

A sewing machine may provide rich learnings for some children and practically none for other children. The same may be true of a musical instrument or a science kit. Recordings that bring peace to one disturbed child may be mere background music for others.

All these materials must have a place where they can be kept and cared for. Nothing is more confusing than a clutter of materials constantly under foot.

Materials do not necessarily need to be so costly that they become prohibitive. An inventive teacher and children, with their resourcefulness and imagination, can make use of simple materials and achieve rich experiences with them.

Implications

If we accept the challenge of the child setting his own pace for learning, what will be some of the implications for education? We shall have need to remember that:

1. A fundamental principle of child development is that all organisms tend to move forward.

2. A certain level of maturation must be attained before the child can feel a need for learning.

3. A teacher must be ever watchful, ever sensitive to the emerging needs and insights of each child.

4. A child often initiates practice and continues in it with satisfaction when the foregoing is true. He will, at this time, seek the help of, or co-operate with, an adult in this practice.

5. A learner remains interested only as he feels himself mastering new and more difficult tasks.

6. Increased emotional and social effectiveness accompanies intellectual growth that proceeds in accordance with the child's own inner design. Thus we have a more fully integrated person.

7. A variety of approaches to learning is more effective than one "best" method.

8. A child's own pacing in his patterns of growth merits the respect of all adults who are pirvileged to share in his growth and development.

If we accept the challenge with its educational implications, we shall see Kenneth move purposefully and successfully through the intricacies of arithmetic and science. We shall see Stephen move from the nonsense of Gelett Burgess to the subtleties of T. S. Eliot. We shall see Sarah grow in her ability to convey her thoughts to others and to make others comfortable in their comings and goings in and out of a social situation.

REFERENCES

1. Brogan, Peggy, and Fox, Loren K. *Helping Children Learn* (Yonkers-on-Hudson, N.Y.: World Book Co., 1955).
2. Carson, Louise. "Moving Toward Individualization," *Elementary English,* Vol. 34, No. 6 (October, 1957), pp. 362-366.
3. Glennon, Vincent J., and Hunnicutt, C. W. *What Does Research Say about Arithmetic?* (Washington, D.C.: Association for Supervision and Curriculum Development, National Education Association, 1952).
4. Hymes, James L., Jr. *Before the Child Reads* (Evanston, Ill.: Row, Peterson & Co., 1958).
5. Lazar, May. "Individualized Reading: A Program of Seeking, Self-selection and Pacing," *Reading in Action* (Pittsburgh, Pa.: International Council for the Improvement of Reading Instruction, University of Pittsburgh, 1957).
6. Nulton, Lucy. "A Loosened Spirit," *Childhood Education* (October, 1957).
7. Olson, Willard C. *Child Development* (Boston: D. C. Heath & Co., 1949).
8. Snygg, Donald, and Combs, Arthur. *Individual Behavior* (New York: Harper & Brothers, 1949).
9. Spache, George. "Personality Characteristics of Retarded Readers," *Educational and Psychological Measurement* (Spring, 1954).
10. Swenson, Esther. "Applications of Learning Principles to the Improvement of Teaching in the Early Elementary Grades," in *Learning and Instruction,* Forty-ninth Yearbook, Part I, of the National Society for the Study of Education (Chicago: University of Chicago Press [Distributor], 1950).

BOOKS FOR YOUNG READERS

THE LAND AND PEOPLE OF EGYPT. By Zaki Naguib Mahmoud. Philadelphia, Pa. Lippincott. 1959. $2.95.

Youngsters from twelve to sixteen who are studying a unit on Egypt or who are engaged in a study of contemporary world problems will find this book extremely rewarding. The author, an Egyptian, pictures his country from ancient times to the present era. He spends much time on the culture of both ancient and modern Egypt, as well as on the geography and resources of this important country.—Paul Zankowich

PUSH AND PULL. By Paul E. Blackwood. New York, N. Y. Whittlesey House. 1959. $3.00.

Young physicists will find this story of energy very rewarding. The author demonstrates nature's energy cycle and explains solar, mechanical, radiant, chemical and nuclear energy.—Paul Zankowich

Developing Creativity in Children

ROBERT C. WILSON
Associate Professor of Psychology and Statistics
Portland State College, Portland, Oregon

"By the time we get children in high school, their creativity has been killed. They all want to be told what to do."

"I feel that I ought to do more to make my pupils creative, but I don't know how to do it."

These are typical remarks of secondary and elementary school teachers. They feel that schools destroy children's creativity and that they, as teachers, have an obligation to attempt to develop it. What can teachers do?

First of all, what is creativity? One might define it as the process by which something new is produced—an idea or an object, including a new form or arrangement of old elements. The new creation may contribute to the solution of some problem, or it may be the production of an aesthetic effect or the clarification of a concept. Indeed it may be any intellectual, emotional, or social problem with which an individual in our society is interested or concerned. The creative solution is aimed primarily at solving a problem which concerns the person engaged in the process. It may or may not solve a problem for someone other than the creator.

It is realized that the foregoing is not a complete definition, but further connotations of the term "creativity" will appear in the remainder of the article. This definition stresses the purposes of the creator and the problem he is trying to solve rather than the purposes and problems of some social group. It also stresses the wide range of problems of daily living, the solutions of which may require creativity.

Creativity in the Classroom

One study of the primary abilities in creative thinking revealed several abilities which seem to be important in creativity in science, engineering, and invention (4). Another study carried on in the Department of Art Education at The Pennsylvania State University found similar abilities to be important for creativity in art (1). These two studies have led to the following suggestions for encouraging "new ideas" in the classroom (3). The validity of the suggested methods has not been established in any systematic research studies. Such merit as they may have rests upon their content validity and the reports of teachers who have employed them.

Brainstorming

Alex Osborn (2) has described a procedure for group thinking sessions designed to provide an atmosphere permissive of new ideas. This procedure, dubbed "brainstorming," can be used effectively in the classroom.

The purpose of brainstorming is to obtain as many ideas as possible in relation to a given problem. There are four simple rules which must be followed:

1. *Judgment is ruled out.* Criticism of ideas must be withheld until later.

2. *Free-wheeling is welcomed.* The wilder the idea, the better; it is easier to tame down than to think up.

3. *Quantity is wanted.* The greater the number of ideas, the more likelihood of finding a successful solution.

4. *Combinations and improvements are sought.* In addition to contributing ideas of their own, participants should suggest how ideas of others can be combined into still another idea.

A problem may be written on the board, and the pupils may be asked to suggest as many ideas as possible, with the teacher listing these ideas on the board. No idea is rejected; every idea is accepted. Each idea stimulates others. At times, the ideas will tumble out so fast that the teacher will have difficulty keeping up.

Only after the ideas have been written down does evaluation take place. The class goes over the list, selecting those ideas that seem most likely to work; modifying some ideas into workable form; and rejecting those ideas that seem unworkable. Next, those ideas that seem workable may be tried out.

Brainstorming may be used with school and classroom problems such as the following: (*a*) "What can we do to make our schoolroom more interesting and comfortable?"; (*b*) "How can we make the line in the lunchroom move more rapidly?"; and (*c*) "What questions would be most interesting to study in this unit?"

On the other hand, brainstorming may be used with personal problems. For example: "What can each of us do to make our home more happy?" or "How can we earn extra money?"

Another possibility involves brainstorming first a list of problems and then a list of suggested solutions for each of the more important problems. For example, "Let's list as many problems as we can that sixth graders must face." Then, in regard to each problem, "Let's list as many ways as we can for solving this problem."

Sensitivity to Problems

A primary mental ability which seems to be important in creative thinking is sensitivity to problems. To solve a problem creatively, one must be aware of the existence of the problem. This ability involves approaching problem situations with such questions as, "What is the problem here?"; "Is the apparent problem the real problem?"; "What would happen if such and such were changed?"; and "How can this situation be improved?"

We are unaware of certain types of problems, because we do not observe the world around us. We are unaware of other types of problems, because we make unconscious assumptions. We take things for granted about our world and its problems. Many creative acts have had their beginnings, because someone questioned an assumption that previously had been taken for granted.

Pupils may be encouraged to make better use of their senses by observation trips. For example, they may be asked to walk around the building; on their return, they may be asked to list the things they saw. Then they may repeat the trip, looking for things they overlooked the first time; after the second trip, they can make a second list.

Other trips can be made to look for objects colored red, for round objects, or for things that one wouldn't see

during another season of the year. The children may be asked to look for unrecognized problems or for things which need to be improved.

Pupils may be encouraged to question some of the things that they take for granted and to consider what things might be like if some basic assumptions in their lives were different. Questions of the "What-would-happen-if——" or "What-would-it-be-like-if ——" variety may serve to develop sensitivity to problems. The following are a few examples:

What would happen if (*a*) everyone in the world were suddenly to become deaf; (*b*) everyone always told the truth about everything; (*c*) we had only three fingers; (*d*) we all lived by the Golden Rule; (*e*) we knew when we would die; (*f*) the air all over the world became radioactive?

Ideational Fluency

A satisfactory solution to a problem is most easily found when one is choosing from a large number of ideas. Individual and group activities, which have as their aim getting as many ideas as possible, are probably helpful in encouraging a second primary mental ability, ideational fluency. Brainstorming is one such activity.

The following list contains some suggestions for helping individual pupils to increase their flow of ideas. The time limits are arbitrary and may be changed to suit the group.

1. List on a piece of paper all the uses you can think of for a brick. You will have five minutes.
2. List as many things as you can think of that are square in shape. You will have five minutes.
3. When students have trouble thinking of ideas to write about in a report or theme, suggest that they first list all the things that might possibly be related to the topic. If pupils do this, uncritically, for fifteen or twenty minutes, they usually will come up with an abundance of ideas from which they may choose.
4. List all the ways you can think of in which you might entertain yourself if you had an evening to spend alone at home.
5. Fluency in creative writing may be encouraged by allowing fifteen or twenty minutes each morning for pupils to write whatever they wish to write. At first, some children may have difficulty in getting started. It may be well to suggest that they write about something that happened yesterday (real or imaginary) or about something that they saw on the way to school.

The teacher may look over the work of four or five pupils each day. It should be emphasized that, during this particular writing exercise, spelling, punctuation, and grammar are not the concern. The important thing is for the children to write anything they feel like writing. Free and fluent development of an idea is the aim.

Encouraging Originality

A third important primary mental ability is originality, the ability to have unusual, uncommon, or clever ideas and to see relationships between things that are only remotely connected.

Classroom activities in this area may encourage a deliberate effort to give uncommon or unusual responses, to look for a different or new way of doing something. The following are some suggested activities:

1. In presenting reports, as in connection with a social studies unit, the pupils may be instructed to use any method other than the obvious ones of reading to or telling the class. Pupils may decide to use dramatizations, quiz sessions, opaque projectors, tape recorders, interview techniques, etc.—the possibilities are innumerable.

2. An adaptation of the first technique is "selling a book." Instead of presenting a book report, a pupil may be told that his problem is to put himself in the position of a salesman. He may use any technique he wishes in an effort to arouse the interest of the class in reading the book.

3. Let the pupils pretend that they are going to write a poem about spring (or any season of the year). "Everyone will have an opportunity to go to the window and look outside for four minutes. When you come back to your seats, you will list all the things you saw that you would not see on a rainy day. If you list something that no one else lists, your score on that idea will be *ten*. If only two or three people in the room put down the same idea, your score will be *five*. If four or five people list the same idea, your score will be *three*. If more than five people list it, your score will be *one*. You will note that the closer you observe and the more uncommon your responses, the higher your score will be."

This activity may be followed by a discussion of creative thinking and the function of unusual or uncommon ideas.

Strong Interests Needed

Studies of the childhood backgrounds of eminent scientists indicate one thing which many of them had in common: They possessed strong interests at an early age, and they have carried these interests into their adult lives so that they have worked at their jobs with persistent intensity and single-minded devotion. For these men, time spent on other activities usually is spent reluctantly and, then, chiefly because of outside pressure. Most of these scientists are happiest when they are working; moreover, they achieve their greatest personal satisfactions through their work.

Many teachers and parents are concerned lest a child will not develop into a well-rounded individual. The evidence seems to indicate that to be a highly productive or creative adult, one cannot be well rounded. One must devote a very great amount of time to one area of interest. In other words, one must be somewhat lopsided.

Teachers, therefore, who feel that creativity is important should not try to force pupils to be well rounded, nor should they force children to play down their strong interest. On the contrary, it would seem that one way to develop creativity might be to encourage pupils to develop some strong interests. The capacity to have a strong interest in something may be an important prerequisite to creativity.

Figuring Things Out

Another interesting finding is that the capacity for intense concentration on a problem accompanies the development of an understanding of the concept of research. That is, at some point in his school career, the more creative individual becomes aware of the possibility of finding things out, firsthand, for himself.

The implication is that creativity may be promoted by situations in which the pupil is encouraged to work out his own solutions to problems. The teacher's task is to provide materials for students to work with; to provide sufficient time for them to manipulate ideas and toy with the elements of a solution; and to provide for problems which do not have pat answers. Obviously, it is not easy to furnish these things for a class of thirty pupils in an already crowded curriculum, which may require that pupils shift to a new subject every forty or fifty minutes.

It is, of course, much easier to tell a student what to do, what to read, and what to think than it is to set up a situation in which he must figure out these things for himself. Perhaps not all students can learn to work on their own. Nevertheless, it seems evident that we, as teachers, have an obligation to encourage them to try.

REFERENCES

1. Lowenfeld, V. "Current Research on Creativity," *NEA Journal*, Vol. 47 (1958), pp. 538-540.
2. Osborn, A. F. *Applied Imagination* (New York: Charles Scribner's Sons, 1953).
3. Wilson, R. C. "Creativity," in *Education for the Gifted*, Fifty-seventh Yearbook, Part II, of the National Society for the Study of Education, ed. R. J. Havighurst (Chicago: University of Chicago Press [Distributor], 1958), pp. 108-126.
4. Wilson, R. C., and Others. "A Factor-Analytic Study of Creative Thinking," *Psychometrika*, Vol. 19 (1954), pp. 297-311.

A Welcome Addition to a Famous Family

KEYS TO READING

An award-winning series of three 16mm sound films that instruct and motivate the student to acquire better reading habits. Subjects covered are, "WORDS," "PHRASES AND SENTENCES," and "PARAGRAPHS."

For free Preview Set or Descriptive Brochure of the new films, or the complete program, direct your request to the address below.

C-B

C-B EDUCATIONAL FILMS, INC.
690 Market Street, San Francisco 4, Calif.

Some Factors Affecting Learning

WALTER B. WAETJEN
Professor of Education, Institute of Child Study
College of Education, University of Maryland
College Park, Maryland

THE last few decades have emphasized the influence of the pupil's mental health and general development upon learning. We have been told that a person's needs, values, and feelings are important in the learning process. Educators have become dedicated to the idea that people experience uniquely, that learning is highly personal. Even so we continue to seek for new knowledge about pupils and the way they learn.

If curricular changes are to be based on more than hunches, then we need to know of new findings relative to the learning process. Some of these findings follow along with suggestions for facilitating children's learning.

Sensory Deprivation

Numerous recent research studies, in which people have been placed in "sensory poor" situations, tell us something about how people learn. Ordinarily, the subjects in these experiments have been people who volunteered to remain as long as possible in a situation in which sensory stimuli were reduced to as low a level as possible. For example, the room in which the experiment took place was devoid of appointment (reduced visual stimuli); a low-level humming noise was ever present (reduced auditory stimuli); and the subjects' arms and legs were encased in cardboard cylinders to reduce tactile stimulation while they remained in a supine position.

Even though the subjects were rewarded handsomely for each hour spent in the isolated situation, they found it to be distressing psychologically. In general, the verbal activity of the people increased, and they became very restive. In addition, many of the subjects reported visual or auditory hallucinations, and all of them told of feeling tension and anxiety.

One might view these results as attempts on the part of the subjects to create their own stimuli when few were available in the immediate environment. All of the experimental subjects told of being unable to concentrate on specific ideas during, as well as after, the experiment.

These findings have implications for teaching and learning in the classroom. For instance, they should cause us to examine rather closely any practice in which children are asked to perform or produce, for lengthy periods of time, in situations having relatively low amounts of sensory stimuli available. Lengthy drill periods and extended examinations are examples of experiences low in sensory stimulation. It is small wonder that some children, while "well prepared," fail an examination dismally.

Conceivably, the lack of sensory stimuli in the test situation arouses tension and anxiety which, in turn, hampers

performance on the examination. Nevertheless, the point must be made clear that we are not questioning drills and examinations as such; we are questioning the length of the examination or drill period and the sensory content.

The Learner's Self-Concept

There is no reason to believe that children do not develop a conception of themselves as learners, just as they do in other aspects of behavior. It is well known that the self-concept arises primarily as a result of the appraisals that are reflected to a child. He tends to see himself as others see him. This tendency, of course, places the teacher in a crucial role in relation to her part in the formation of children's self-concepts. Teachers are important people in the lives of children and youth.

Occasionally a teacher will explain the assignment of a failing grade to a youngster by saying, "All people must learn to handle failure, and so must this student." True, it would be a most unusual person who did not meet failure in some form during his life, but we cannot be too self-righteous in making a statement such as the foregoing one. To make such a statement, without knowing the experience background of a pupil, is to invite learning disability.

Perhaps the school personnel have a responsibility for helping children to formulate two percepts: one of themselves and one of the school. If children act on their perceptions, then it seems logical that we would want for them to perceive themselves as learners so that they would behave accordingly. Moreover, we would be equally desirous of their perceiving the school as a good place. We can aid the development of these percepts by reflecting to children their success, rather than their failure, in learning situations.

Critics will be quick to say that this approach breeds unreality and even softness. Not so! We must be careful not to contrive or fabricate the success. The success reflected to the youngster must be based on reality. It is important for us to keep in mind that we are trying to get children to see themselves as learners and that we, as teachers, have an important role to play in this connection.

The person who is able to tolerate failure is the person who has a great sustaining reserve of success and, therefore, is the person who has a healthy view of himself as a learner.

Unique Modes of Learning

Not even the most uninformed person would deny that children have different rates and capacities of learning. Our casual observations of children confirm this fact. Research findings make it ironclad. In essence, we can say that learning is an individual matter. The uniqueness of the learning process is revealed, also, in the way children learn.

During the diagramming of sentences in a high-school English class, the teacher noticed a boy who appeared to be working in a strange manner. On questioning him, the teacher discovered that, instead of identifying the subject of the sentence first and then the predicate, the boy was reversing the procedure. Oddly enough, he did not appear to be having any difficulty, but he was performing the operation differently from the way he had been instructed.

In response to the teacher's query as to why he was doing the diagramming

in his peculiar fashion, the boy said, "If I can decide *what* is being done, then I can determine the subject." In a rather guileless manner, the young man was saying that he had a unique way of learning and that, for him, it was effective.

A recent research study by Hughes (1) raises a question about the role teachers play in getting children to utilize their unique modes of learning. The study involved intensive observations of teachers in their interactions with children. One of the major findings states that, "The control of the teacher was most prominent and demanding over the minutia of what the child would study or give his attention to and exactly how he would answer. For much of the time, the *what* he was to answer and *how* he was to answer were predetermined by the teacher."

The implication is quite clear. We not only hold up for children what they should learn, but also decide how they should learn it. That is to say, in many instances, children are being asked to learn in ways inconsistent with their own modes of learning.

The "what" aspect of the curriculum is to be found in our curriculum guides and courses of study, but the "how" aspect of the curriculum, while nonetheless real, usually is not written. Can we require children to learn in ways that may be unreal and even distressing to them and then evaluate these children in terms of how well they have learned the mode as well as the content?

Anxiety and Learning

To many people, anxiety and learning are distinctly unrelated factors in human behavior. Actually, however, anxiety is indeed a motivating force which may be the wellspring of learning. A modicum of anxiety seems to "tune" the organism for learning. However, when anxiety mounts and reaches the point where it interferes with learning, then we need to be concerned.

Sarason and his associates (2) have found that high anxiety is negatively correlated with intelligence. One could make quick but erroneous interpretations by saying that less intelligent people are more anxious people. A more accurate interpretation would be that anxious people take their anxiety to the intelligence-testing situation, thereby hampering their performances.

The same researchers have detemined that some children are very anxious about test situations. If this is true, we can find some explanation for the children who, though seemingly bright, perform poorly on tests. The bright but anxious child is one who usually has difficulty in school. On occasion, his brightness is evident to the teacher or parent, but, when he must demonstrate his knowledge, anxiety catches up with him. His poor performance sometimes incurs the wrath of teachers and parents who claim that the child is not trying, or that he has not studied.

Highly anxious children are known to be dependent persons. Teachers, without exception, can point to the youngster who, after being given careful and detailed instructions, will ask questions such as, "Is this what you told us to do, Mrs. Wheeler?" or "Is this right so far?" We shudder to think of having thirty-five highly anxious, dependent children in a single classroom.

Highly anxious children seem to predict negative consequences for themselves. Hence, they will enter into a de-

pendent relationship in order to relieve some of their anxiety. The very nature of the dependency suggests that an immediate feedback of results of performance in learning situations helps to reduce the anxiety of highly anxious children. On the other hand, to require these students to be independent is to ask them to act on their own cues and experiences, which they do only with great difficulty.

The "A-ha!" Experience

One of the gratifying moments in teaching comes when a student is observed to be profoundly affected, even stunned, by what he is learning at a given instant. Often the child cannot even report the extremely rapid progress of his learning, because his attempts to verbalize are much slower than the pacing of his learning. The learner finds that things seem to "fall into place"; new relationships are discerned; nuances of meaning are discovered; and novel applications are perceived.

This is the "A-ha!" experience in learning. One feels exhilarated and inclined to say, "A-ha! This is what I have been seeking in learning."

Unfortunately, this moving experience occurs but infrequently. Perhaps it occurs when we momentarily take a small and figurative step outside the boundaries of our self-organization. The small step enables us to free ourselves, for a fleeting instant, from our customary biases and from the channeling of our perceptions. In short, we come to perceive that which we ordinarily are unable to perceive.

Two conditions seem to be conducive to the experiencing of the "A-ha!"; however, both conditions do not need to be present at the same time. The first condition stipulates that people present in the learning situation are accepting and permissive people. They are permissive in the sense that they have intellectual freedom to explore new avenues of thought and to analyze their experiences. These people are not only accepting and permissive but also creative. Their willingness to "think at right angles" to the way other people think encourages people in their presence to do likewise.

A second condition conducive to this type of experience has reference to the learning situation in general. The more varied and rich the immediate environmental situation is, in terms of its perceptual content, the more likely it is that the "A-ha!" experience will occur. It should be emphasized that sensory deprivation impedes learning, while a sensory-rich environment catalyzes it.

REFERENCES

1. Hughes, Marie B. *Development of the Means for the Assessment of the Quality of Teaching in Elementary Schools* (Salt Lake City, Utah: University of Utah, 1959), p. 182.
2. Sarason, Seymour B., and Others. "A Test Anxiety Scale for Children," *Child Development*, Vol. 29, No. 1 (March, 1958).

Knowledge is of two kinds; we know a subject ourselves, or we know where we can find information upon it.

—Samuel Johnson

Parent-Teacher Education and Child Development

R. N. LOWE
Co-ordinator, School Psychological Services
School of Education, University of Oregon
Eugene, Oregon

THE purpose of this paper is to provide a rationale and description of a parent-teacher education center with particular reference to affording instruction in child development.

The Community Parent-Teacher Education Center is based upon a concept of psychology contributed by the late Alfred Adler (1), noted Viennese psychiatrist, and introduced in this country by Dreikurs (4).

The setting for the parent-teacher education center grows out of a group approach to solving problems of parent-teacher-child relationships. Parents, teachers, children, and other interested people, under the leadership of the counselor, share in the solutions to these problems. The counseling sessions are open to professional and lay persons alike. The assumptions in this approach are as follows (5):

1. Teachers at the pre-service and in-service levels may observe the dynamics of human interaction and, thereby, may gain meaningful experiences as they relate to developing a better understanding of children's behavior as well as their own.

2. Many parents, seeking to improve their relationships with their children can profit from information which may preclude the need for later therapy.

3. "Open" centers make it possible for many parents and teachers to profit from the concerns of a few.

4. Reaching larger numbers at an earlier stage of maladjustment will be less expensive, will be preventive, and will require fewer persons.

5. A child who presents himself in the classroom situation with a minimum of behavior problems is likely to be more co-operative in teaching-learning activities than a child who has many behavior problems.

It is worthy of note that, in America, we have a number of organizations promoting better parenthood through parent education, with study groups for parents being widely encouraged. At the same time, education for teachers has long been recognized as essential for intelligent working with children. Yet there is no evidence of any widespread movement for bringing parents and teachers together in their common tasks of helping children.

Unwittingly, increasing specialization, so characteristic of our culture, has widened the gap between the home and the school. The gap is so wide that many people actually believe the home and the school have separate functions, each without any responsibility to the other. In reality, the problems of discipline,

training, and education are the same for the parent as for the teacher.

Teachers Need a Re-orientation

It is almost axiomatic that teachers are becoming increasingly aware of the primacy of a psychological understanding of children, particularly as it relates to the learning process. One needs but to attend a teachers' convention, teach a class of experienced teachers, or visit a school to realize that the gap between theory and practice in working with children is all but irreconcilable.

While many teachers are able to motivate children in terms of sound principles of learning, few know that they are doing this, and even fewer know the principles underlying what they are doing. Some teachers rely on intuition; others on feeling; and a few on empathy, rather than on a clear notion as to what they are doing and why. In short, they are without a theoretical and practical frame of reference.

Many teachers are becoming alarmed at their inability to cope with the child who either misbehaves or is unwilling to learn. Few teachers realize that they may even provoke the very responses they seek to prevent or improve (10).

Teachers not acquainted with a functional understanding of the purposive approach to understanding children's behavior develop intense feelings of inadequacy in their teaching roles (6, 9).

Traditionally, teacher-education programs have been satisfied with telling prospective teachers how to teach. The lecture-textbook approach continues to provide platitudes concerning the role of the school in educating for democracy; the merits and demerits of homogeneous groupings; the provision for individual differences; the need for opportunities for the gifted and the retarded; and so on. This approach, lacking in enthusiasm and imagination, discourages spontaneity and creativity on the part of the college student studying for teaching.

Until teachers have the opportunity to become acquainted with the goal-directed concept of human behavior, they are not likely to understand children nor to deal with them effectively. Consequently, the present untenable situation which exists in our schools may well become tragic.

The Teacher's Task

The teacher's task, whatever else it may be, is working with people: parents, children, administrators, janitors, fellow teachers, and others. This is the teacher's task, because these people are interdependent in implementing the school program. The primary purpose of the school program is to effect changes in the behavior of children to the end that they will develop to their greatest potential, intellectually and socially, in terms of self-awareness and social contributions. Whatever children learn is of value only as it contributes to this end. Montagu has written:

"We must shift the emphasis from the three R's to the fourth R, human relations, and place it first, foremost, and always in the order of importance as a principal reason for the existence of the school. . . . We must train for humanity, and training in reading, writing, and arithmetic must be given in a manner calculated to serve the ends of that humanity. For all the knowledge in the world is worse than useless if it is not humanely understood and humanely

used. An intelligence that is not humane is the most dangerous thing in the world." (8)

Adler's Individual Psychology (2) suggests that the traditional atomistic approach to educating teachers is unsound. It further suggests that a more reliable approach will focus on the total personality of the teacher-in-training as she is encouraged to grow in her ability to think about and work with the total personality of the child. This requires a relatively new approach to teacher education.

Mechanistic theories of psychology induce a fragmentized approach to teaching. The purposive theories of psychology permit a unified approach to teaching, making it possible to integrate problems of learning, behavior, and human relationships. Child-guidance centers provide opportunities for the prospective teacher and the in-service teacher to study the child in the larger situation: the home, the school, and the community. Only then may we understand the goals toward which the child is striving (7).

The Center

The Community Parent-Teacher Education Center is the result of the combined efforts of the University of Oregon School of Education, the General Extension Division of the State System of Higher Education in Oregon, the Eugene Public School District, and the Francis Willard (School) Parent-Teacher Association.

The Center is conducted by a director, the writer, who is also the counselor, with the assistance of psychiatric, medical, psychological, sociological, and educational consultants. The function of this team is to assist the director in developing the program with due consideration given to psychiatric, medical, research, sociological, and educational problems respectively. The operating staff, in addition to the director, includes an intake interviewer, a recorder, a librarian, a playroom supervisor, and a secretary. These personnel are all graduate students.

In addition, a Community Advisory Board of persons selected by, but not necessarily from, the P.T.A. has been established to facilitate the public-relations work of the Center. The Board is considered essential as an interpreter to both the Center staff and the public. The program is scheduled Saturday mornings, thereby maximizing opportunities for attendance by both mothers and fathers, as well as by campus students and practicing teachers. Attendance at these sessions is unrestricted and at no cost to parents.

Pre-Service Teacher Education

The establishment of the Parent-Teacher Education Center for use with students at the pre-service level reduces the intensity of, if not precludes, the shortcomings currently characteristic of child-development courses. Such an approach minimizes unnecessary duplication and eliminates confusion.

A theory-and-practice course followed by a second quarter of added practice and participation provides the student with an adequate behavioral and learning frame of reference which will enable him to begin a career in teaching. The theoretical part of the course is oriented in Individual Psychology, as it relates to teachers' and parents' tasks in working with children.

The practice sessions are held in the Parent-Teacher Education Center where the student can participate in the interaction of parents and children with the counselor, parents with parents, and children with parents. This first course provides ample opportunity for the student to have firsthand experiences in relating theory to practice.

In the second term, the student goes beyond the center counseling sessions to include observations in the playroom; some experiences in observing the intake interviewer in her interviewing; careful recording and evaluation of the center sessions; participation in the follow-up studies; and supplemental reading in Individual Psychology. Diagnoses and plans of action are carefully considered.

In-Service Teacher Education

For many practicing teachers new to the ideas of Individual Psychology, in general, and the techniques of child-guidance centers, in particular, a program similar to that outlined for the undergraduate is of value. In this instance, however, one important element is present which is not found on the undergraduate level: that of the teacher experiencing daily the problems of children behaving in a manner which is disturbing both to school personnel and parents.

The motivation growing out of the discussion of "live material" taken from actual class situations is important. Consequently, readiness for learning on the part of the teacher is abounding. It is in the Parent-Teacher Education Center that the professional educator "practices what he teaches"; theory and practice become integrated.

Summary

Child-guidance centers offer no panacea to the problems of educating our children to live creatively and co-operatively in an adult world. If marked and permanent inroads to the problems are made, they will be accomplished only with the *help* of teachers if not *by* them. Therefore, a new orientation is essential.

Courses, mechanistically taught, will not do the job. Students training to be teachers must have ample opportunities to "live" their training, for as Cantor has written, "Real learning is not merely cerebral; it ends in a muscle or a gland."

REFERENCES

1. Adler, Alfred. "A Doctor Remakes Education," *Survey*, Vol. 58 (1927), pp. 490-491.
2. Ansbacher, H., and Ansbacher, R. *The Individual Psychology of Alfred Adler* (New York: Basic Books, 1956).
3. Cantor, Nathaniel. "What Education is Not," *Educator's Washington Dispatch*, July 20, 1950.
4. Dreikurs, R. *Psychology in the Classroom* (New York: Harper, 1957).
5. Dreikurs, R., and Others. *Adlerian Family Counseling* (Eugene, Ore.: University of Oregon Press, 1959).
6. Jersild, Arthur T. *When Teachers Face Themselves* (New York: Columbia University Press, 1959).
7. Kelley, E. C., and Rosey, M. I. *Education and the Nature of Man* (New York: Harper, 1952).
8. Montagu, Ashley. *On Being Human* (New York: H. Schuman, 1950), p. 111.
9. Moustakas, Clark E. "Self-Explorations of Teachers in a Seminar in Inter-personal Relations," *Journal of Individual Psychology*, Vol. 13 (May, 1957), pp. 72-93.
10. National Education Association, "Teacher Opinion on Pupil Behavior, 1955-56," *Research Bulletin* (April, 1956).

School Interests In Later Childhood

SISTER MARY AMATORA, O. S. F.
Professor of Psychology, St. Francis College
Fort Wayne, Indiana

THOUGH interest studies have been made for several decades, most of them have been made at the adult or adolescent levels. Comparatively few studies have been made at the level of childhood. On the other hand, curriculum studies have advocated the inclusion of children's interests in programs of study. Therefore, the present writer sought to determine the school interests of boys and girls in later childhood.

One grade level was used for the study, rather than an age-level group. While there is a wide range of age levels in each grade level (particularly in the elementary school), one does find common interests.

Purpose and Method

Most studies of interests have been based upon questionnaires, inventories, or check lists which contain, inherently, an element of suggestion. The writer felt that a more accurate estimate of interests could be ascertained if the children were free to express their interests without any presuggestions. For the study, a number of private schools in various areas of the United States were contacted. Ten schools in such widely separated states as California, Washington, Maine, Pennsylvania, Minnesota, North Carolina, Texas, Louisiana, Missouri, and Indiana were used. Schools were located in cities or towns ranging in population from 2,000 to 800,000. Enrollment in these schools ranged from 127 to 926 pupils.

Specific directions, in a form letter, were sent to the principals of the co-operating schools. The letter requested that each pupil write his age, grade, sex, school, city, state, and the date at the head of the paper.

It was made imperative that there be no prediscussion concerning interests and no communication between pupils. Promptly the teacher or principal was to ask the following question: "What are three of your greatest interests connected with school life, in the order of importance to you?" Immediately after the pupils had listed their choices, the papers were to be collected and forwarded to the writer.

A total of 359 papers were received from the ten co-operating schools. Of these, twelve papers were eliminated because of incomplete data or illegibility, leaving a total of 347 papers from 164 boys and 183 girls for the present investigation.

An analysis of the chronological-age range for the fourth-grade boys revealed that the youngest was eight years of age; the oldest, twelve; and the mean age, 9.5 ± 0.5. The fourth-grade girls ranged in age from eight to eleven years and had mean age of 9.2 ± 0.3.

Boys' School Interests

Boys' school interests are presented in Columns 1, 4, and 7 of Table 1. Among first choices of interest, arithmetic leads the list, with nearly one-fourth of the boys in the study selecting this subject as their first interest.

Following arithmetic are four other areas chosen by many boys in the study group: geography ranks second, with 13.2 per cent; reading, third, with 11.3 per cent; and religion, fourth, with 10.5 per cent.

A study of the second choices of these boys presents a somewhat different picture. Spelling holds first place, with more than one-fifth of the boys choosing this subject as their second interest. Following spelling, one finds arithmetic, 15.2 per cent, and geography 13.1 per cent.

Among third choices of interests, as reflected in Column 7, one finds again a shift in choice. Religion ranks first, with 16.5 per cent of the boys indicating this subject as their third interest. Religion is closely followed by spelling, with 15.1 per cent, and reading, with 11.1 per cent.

Combining the figures in Columns 1, 4, and 7, one finds a total of 47.7 per cent of all the boys choosing arithmetic as their first, second, or third interest. Spelling is a close second, with 45.4 per cent. Three other areas claim the interests of about one-third of the boys: geography, 33.3 per cent; religion, 33.3 per cent; and reading, 30.6 per cent.

One readily sees that these five subjects claim the highest interest among academics with these boys in later childhood. Other areas carry a considerably smaller percentage of the boys' interests.

Nonacademic Interests

That there are interests other than academic ones connected with school life is obvious from the second portion of Table 1. Again looking at Columns 1, 4, and 7, one finds sports claiming the greatest interest; all told, 12.7 per cent of the boys included sports as one of their three choices.

Other interests simply were listed as activities during the intermission, or as play in general. However, nonacademic interests account for a very small percentage of interests connected with school life.

The very fact that a certain percentage of boys expressed nonacademic aspects of school life as their prime interest poses a problem for the teacher. There must be a definite reason why some boys are more interested in these items than they are in the subject-matter areas of learning, which constitute most of the school curriculum.

Girls' School Interests

The school interests of girls in later childhood are tabulated in Columns 2, 5, and 8 of Table 1. A glance at these three columns indicates that the highest percentage of interests among girls varies somewhat from choice to choice.

Column 2 indicates that 19.1 per cent of the girls listed arithmetic as their first choice of interest at school; 16.1 per cent listed spelling first; 14.1 per cent, art; 12.1 per cent, reading; 10.4 per cent, religion; and 8.3 per cent, geography. These six areas account for the first choices of more than four-fifths of all the girls in the study.

The second choices among girls are indicated in Column 5. Here one per-

TABLE 1

FIRST, SECOND, AND THIRD CHOICES OF SCHOOL INTERESTS OF FOURTH-GRADE BOYS AND GIRLS

Item Categories	First Choice			Second Choice			Third Choice			Grand Total Average
	Boys	Girls	Total	Boys	Girls	Total	Boys	Girls	Total	
Academics										
Arithmetic	23.4	19.1	21.2	15.2	11.1	13.2	9.1	16.3	12.7	15.7
Art	3.1	14.1	8.6	6.1	5.2	5.7	4.3	10.1	7.2	7.2
English	3.4	1.2	2.3	1.4	7.1	4.3	8.2	3.4	5.8	4.1
Geography	13.2	8.3	10.7	13.1	10.2	11.6	7.0	8.2	7.6	10.0
Health	3.1	1.4	2.2	1.2	4.0	2.6	3.6	3.1	3.4	2.7
History	1.5	4.1	2.8	5.3	4.1	4.7	8.1	7.2	7.7	5.1
Music	2.4	4.2	3.3	4.1	5.2	4.7	3.4	3.3	3.4	3.8
Reading	11.3	12.1	11.7	8.2	13.1	10.7	11.1	7.1	9.1	10.5
Religion	10.5	10.4	10.5	6.3	10.5	8.4	16.5	9.5	13.0	10.7
Science	6.2	1.3	3.7	6.3	1.4	3.8	3.4	2.3	2.7	3.4
Spelling	9.1	16.1	12.6	21.2	16.1	18.7	15.1	16.1	15.6	15.6
Writing	1.3	1.2	1.3	2.2	2.3	2.2	1.4	3.2	2.3	1.9
Nonacademics										
Intermissions	1.2	2.0	1.6	2.1	2.1	2.1	3.1	5.1	4.1	2.6
Sports	6.2	1.3	3.7	5.1	2.2	3.6	1.4	1.4	1.4	2.9
Play	1.1	2.1	1.7	1.2	3.3	2.2	0.3	2.1	1.2	1.7
Miscellaneous	3.0	1.1	2.1	1.0	2.1	1.5	4.0	1.6	2.8	2.1
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

ceives spelling to receive the highest rank, 16.1 per cent. It is followed by reading, 13.1 per cent; arithmetic, 11.1 per cent; religion, 10.5 per cent; and geography, 10.2 per cent.

The third choices of the girls are indicated in Column 8. Arithmetic ranks first, with 16.3 per cent of the girls selecting this subject as their third interest. Spelling follows closely with 16.1 per cent. A considerable drop then occurs. Art ranks third, with 10.1 per cent, and religion ranks fourth, with 9.5 per cent.

By combining the percentages in Columns 2, 5, and 8, to ascertain the total number of different girls expressing interest in a particular item, one finds interest in spelling and arithmetic claiming nearly one-half of the girls in the study. Spelling was selected as first, second, or third interest of 48.3 per cent of the girls; arithmetic was indicated as one of the three major interests of 46.5 per cent of the girls.

A total of 32.3 per cent of the girls expressed an interest in reading, while a total of 30.4 per cent expressed an interest in religion. Following these subjects, in order, were art, geography, history, music, English, and health.

Interests in Nonacademics

A small percentage of the girls listed nonacademic items among their three interests. While these figures are not large, they do indicate that some of the girls are more interested in nonacademic activities connected with school than they are in subject-matter areas.

Among nonacademic items, the various periods of intermission rank highest, claiming a total of 12.3 per cent of the girls in all three choices. Combined choices rank play second highest, with

a total of 7.5 per cent, while sports rank next, with 4.8 per cent.

Sex Differences and Similarities

It is interesting to note sex differences among both the academic and the nonacademic interests of boys and girls in later childhood. Comparing first choices of interest, one finds more boys than girls interested in science, arithmetic, geography, and (to a lesser degree) health, and English.

On the other hand, one finds a much larger percentage of girls than boys interested in art and in spelling. With smaller differences, more girls than boys are interested in history, music, and reading. The only areas in which boys and girls show approximately the same amount of interest are religion and writing.

A comparison of second choices of interest reveals more boys than girls interested in science, arithmetic, spelling, and geography. More girls than boys are interested in English, reading, and religion. Other areas, showing smaller differences favoring the boys are art and history, and those favoring the girls are music and health.

A comparison of third choices of interests reveals further sex differences. Here one finds the boys revealing the highest percentage of interest in religion, with a substantial increase over the number of girls expressing interest in this subject. Other interests favoring the boys are English and reading, and (to a lesser extent) history and science.

Among third choices, girls indicate more interest in arithmetic, art, (and to a lesser degree) writing, spelling, and geography. Interest in music is approximately the same for both sexes.

Sexes Combined

Analysis of total interest areas, as shown by Columns 3, 6, and 9 of Table 1 reveal area differences. When both sexes are combined, arithmetic leads among first choices of interest, claiming 21.2 per cent. Following this, there is a considerable drop, with spelling showing a combined interest of 12.6 per cent; reading, 11.7 per cent; geography, 10.7 per cent; religion, 10.5 per cent; and art, 8.6 per cent. These six areas account for nearly three-fourths of the expressed first-choice interests of boys and girls in the later childhood period.

When second choices of interest are combined for both sexes, one finds the same five areas claiming most interest. According to rank, these are: spelling, arithmetic, geography, reading, and religion.

Analysis of third choices of interest for the combined sexes, as revealed in Column 9, indicates three of the former areas still claiming high interest. In order, these areas are: spelling, religion, and arithmetic. Reading remains in fourth place; history is fifth; geography, sixth; and art, seventh in rank.

The last column of Table 1 indicates the grand total averages for all choices for all the 347 children in the study. Here one finds the two highest-ranking subjects to be arithmetic, with 15.7 per cent, and spelling, with 15.6 per cent. Three areas, each claiming about one-tenth of the combined interests, are religion, 10.7 per cent; reading, 10.5 per cent; and geography, 10.0 per cent.

Nonacademic Interest Areas

In all choices and for both sexes, one finds a small percentage of children ex-

pressing their principal interests in the nonacademic areas of school life. Sex differences in these areas are most obvious in sports. Among both first and second choices, boys exceed girls considerably. Among third choices in this area, the amount of interest is similar.

In the activities of the various intermissions, one finds among first and third choices a higher percentage for the girls than for the boys. Among second choices, one finds equality.

Various other types of play hold considerably more interest for girls than for boys at all three choices of interest. In the smaller number of miscellaneous items, listed by more boys than girls, were included such items as hobbies, holidays, fire drills, homework, last bell, library, etc.

Composite Interest Areas

The specific item categories were grouped according to their general areas in order to present a composite picture of interests. These composite interest areas are presented in Table 2.

Analysis of this table reveals that among the first choices of interest, language arts ranks first, claiming 27.9 per cent of the boys and girls, with mathematics and science a close second, claiming 25.0 per cent of the children. While more boys than girls show an interest in mathematics and science, more girls than boys indicate an interest in the language arts.

The next highest ranking among first choices of interest is social studies, claiming 17.8 per cent for the boys and 13.8 per cent of the girls. Music and art claim more than three times as much interest among girls as among boys—18.3 per cent as against 5.5 per cent.

Among second choices of interest, language arts ranks first, claiming more than a third of all boys and girls. Following at a considerable distance are social studies, with 18.9 per cent, and mathematics and science, with 17.0 per cent.

In the second choice among composite areas, a notable sex difference occurs, with girls showing greater interest in religion than the boys, and with boys showing greater interest in mathematics and science than the girls.

Analysis of third choices again reveals language arts capturing the interest of almost one-third of the boys and

TABLE 2

COMPOSITE INTEREST AREAS OF FOURTH-GRADE BOYS AND GIRLS

Areas	First Choice			Second Choice			Third Choice			Grand Total
	Boys	Girls	Total	Boys	Girls	Total	Boys	Girls	Total	Average
Math & Science	29.6	20.4	25.0	21.5	12.5	17.0	12.5	18.6	15.5	19.2
Social Studies	17.8	13.8	15.7	19.6	18.3	18.9	18.7	18.5	18.6	17.7
Language Arts	25.1	30.6	27.9	33.0	38.6	35.9	35.8	29.8	32.8	32.2
Music & Art	5.5	18.3	11.9	10.2	10.4	10.3	7.7	13.4	10.6	11.0
Religion	10.5	10.4	10.4	6.3	10.5	8.4	16.5	9.5	13.0	10.6
Intermissions	1.2	2.0	1.6	2.1	2.1	2.1	3.1	5.1	4.1	2.6
Activities	7.3	3.4	5.4	6.3	5.5	5.9	1.7	3.5	2.6	4.6
Miscellaneous	3.0	1.1	2.1	1.0	2.1	1.5	4.0	1.6	2.8	2.1
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

girls. Following, though at a considerable distance, are social studies, 18.6 per cent; mathematics and science, 15.5 per cent; religion, 13 per cent; and music and art, 10.6 per cent. Among third choices, sex differences are apparent in religion, favoring the boys, and in music and art, favoring the girls.

Combining the totals given in Columns 3, 6, and 9 one finds language arts ranking highest, with 96.6 per cent of all the boys and girls selecting this area as either their first, second, or third choice of interest.

Nearly one-half of the boys and girls chose mathematics and science and/or social studies as one of their three interests. Nearly a third of the children indicated music and art and/or religion.

The last column of Table 2 indicates the grand total average for the composite areas for first, second, and third choices combined for both sexes. Here one sees the over-all picture of interest areas. Of the total expressed interests of the children studied, the language arts claims nearly one-third and mathematics and science, nearly one-fifth. Following these areas, one finds social studies, 17.7 per cent.

The nonacademic areas clearly claim a very small percentage of children as a major interest. All nonacademics combined claim only 9.3 per cent of all boys and girls.

The study reveals that boys are most interested in mathematics, spelling, geography, religion, and reading, in that order. Sex differences reveal that more boys than girls are interested in mathematics and science, while more girls than boys are interested in language arts. Interest in religion is practically the same for both sexes. Nonacademic interests claim a few children.

It is imperative, in today's education of children, that interest be considered both in curriculum planning and in lesson planning. Since motivation is an important factor in learning at all age levels, teachers can readily see the need for a knowledge of children's school interests. It frequently happens that where children find no real need, they will not exhibit permanent interest in any area.

Considerably more research in the broad field of children's interest is necessary for the improvement of instruction at this age and grade levels. Both intensive and extensive research is needed in the relation of children's interests to motivation, to curriculum, and to the objectives of the school.

THE GRACE M. ABBOTT TEACHERS' AGENCY
PHILIPPE L. JOYAL, MANAGER
120 BOYLSTON STREET
BOSTON 16, MASS.
MEMBER N.A.T.A.

BRYANT
TEACHERS BUREAU
1025 WITHERSPOON BLDG.
PHILADELPHIA 7, PA.
PE 5-1223
42nd Year of Selective Placement Service for Schools and College Positions
Member — N.A.T.A.

The ABC's of Personality Evaluation

C. R. MEEK AND C. E. SKINNER
Southern Illinois University
Carbondale, Illinois

PERSONALITY is evaluated on all levels and with all degrees of thoroughness. All of us make a practical personality appraisal of each person with whom we are associated. These are informal and incomplete appraisals, but they serve to increase our effectiveness in dealing with others in everyday affairs.

In this paper, more formal practices of evaluating personality by professional workers will be considered. Two levels seem to be indicated. For educational purposes, a broad comprehensive understanding of the child's characteristics and development is necessary. In case of disorders or threat of disturbed growth, a more intense study of the personality is indicated.

Nature of Personality

Personality is a concept used in reference to the highly complex total, dynamic, living person. Numerous personality theories provide theoretical framework for evaluating personality; some workers (counselors and psychiatrists) stick closely to their own theories, while perhaps the majority are eclectic.

Theories devised by psychologists usually are broadly classed as trait or factor theories, which focus on the various attributes of the person, and self-theories, which focus on central organization. Some leading approaches used by psychiatrists are psychobiological, organismic, and existential. Current psychoanalytic approaches are classic psychoanalytic, interpersonal, cultural, holistic, and others.

Evaluation of personality depends primarily on a broad understanding of the human and his behavior and on competencies in using the techniques of studying personality. This broad understanding, needed for adequate interpretation of information obtained by the various techniques, is drawn from several special areas of study:

1. *Psychological statistics* for extent of deviation in characteristics
2. *Psychology of individual differences* for information regarding the range of distribution of various attributes and functions
3. *Developmental psychology* for norms and extent of deviation on all age levels
4. *Psychiatry and abnormal psychology* for comprehension of malfunctioning
5. *Cultural anthropology* for impact of the culture
6. *Social psychology* for a background of forces in social adjustment
7. *Learning and psychotherapy* for dynamic factors
8. *Personality theory* for interpreting and integrating the data

Most teachers and other members of

the school staff do not have sufficient background to study personality on a deep level; therefore, a number of methods have been devised to obtain a working knowledge of personality on the educational level. Many of these methods are used both by teachers for school appraisal and by specialists on a deeper level. Since these methods are generally known, only a brief view will be taken of them before considering in more detail the methods most frequently used by specialists.

School Evaluation

The most commonly used objective methods are: records of grades, indicating past achievement; achievement test results, indicating achievement level; test of mental ability, indicating general scholastic aptitude; aptitude-test results, indicating more specific strengths and weaknesses; interest inventories and other indicators of interest, showing preferences and inclinations; and work samples, indicating unique achievement not reflected elsewhere.

The individual's own view of self and personal concerns usually is obtained through structured instruments and less-structured personal documents.

Structured instruments most frequently used to obtain the individual's own views are: the problem check list, providing a check of troublesome problems; personality inventories, giving personal opinion of how one typically reacts in important adjustment situations; personal-data blanks, furnishing more general factual data; attitude check lists, indicating basic attitudes toward school, home, etc.; and rating scales, indicating the individual's evaluation of traits or characteristics.

Personal documents allow the student to express feelings and concern in his own informal way. The autobiography may be left open for the student to tell his own story in his own way, or it may be written according to a detailed outline which gives assurance that no important area of his life is omitted.

Short reaction reports indicate feeling and thinking about any particular situation for which such personal data are needed. The work schedule and log may provide an account of how the student spends his time for any length of period desirable. The diary is useful for revealing personal reactions of a more intense kind to a few significant experiences each day. Themes and other less personal papers may be used when the other personal papers are likely to upset the pupil.

Objective observations by other people give pictures of the individual in action in his natural setting. Anecdotal records may give word pictures of the individual in a wide variety of school activities. Ratings provide data concerning social-stimulus value and may be made on any traits which it is desirable to include on the rating scale. Sociometric techniques may be used to explore preferential relationship between the individual and other pupils in the school. The "Guess Who" technique is frequently used to determine more obvious social traits and impressions made on others.

Data obtained through the use of the aforementioned methods of studying pupils are placed in the cumulative record. The record, in turn, becomes an inclusive instrument in studying a child's personality. It usually is considered the beginning point of personality study. Then, after the other methods are used

as needed, the cumulative record is further used in interpreting and integrating data. If a child is referred to a specialist, the cumulative record is used to give fundamental information, thereby saving much time and effort in the diagnosis.

The case conference is a co-operative method which is widely used to gain better understanding of a particular pupil who has serious adjustment problems. It also is used to help increase teachers' understanding of personality. In this method, all the staff members who work with the child study the cumulative record; pool their personal knowledge of the child and his behavior; seek other information that may be needed; and plan an approach which seems to be indicated by the causes contributing to the difficulty. This procedure may be repeated several times if necessary.

Specialist's Evaluation

Of all the approaches toward understanding personality and behavior of children, the psychological interview is always of major importance. The diagnostic interview is carefully structured by the specialist to explore all indicated aspects of the depths of the client's mental structure without creating guilt and anxiety from troublesome material which is uncovered.

The interviewer understands what he is doing. Oftentimes, he will find it desirable to probe the client's confused or irrational thoughts. Nevertheless, he is sensitive to the need of providing therapeutic measures to eliminate threat and to reduce repression. At other times, he will explore with the client his more obvious thoughts and feelings toward the world, toward his family, and toward himself. At times, the client will be stimulated to do most of the talking. Thus he will experience a therapeutic, cleansing or cathartic effect, while the counselor listens actively to further increase his understanding of the client. There are times when the client will release his feeling or reveal his inhibitions, complexes, or conflicts only when the interviewer skillfully leads and reassures him, as they explore his deeper emotions.

The interview, when skillfully conducted, is the most flexible of all diagnostic instruments. Moreover, it has the greatest potential in getting at the "causes" of behavior problems and in assessing progress.

Many other methods are used in conjunction with the interview. Written or printed questions or statements to which the client is asked to respond may be used when desirable. As a rule, however, the specialist will prefer flexibility of a less-structured interview, which enables immediate change of structure when new leads or unexpected materials in some hidden area are detected.

In recent years, projective tests and techniques have received considerable attention—certainly too much attention from people who are not trained in this field and from some who have been trained in this field with little or no foundation in other areas.

In a projective test, the response made by the client reflects his typical inner emotional responses, deeper concerns, manner of perceiving, patterns of organizing his perception, and the like. The projective test, for example, may consist of a series of pictures about which the client tells stories. He may become so absorbed in developing

themes around each picture that he will say things about the characters in his stories which really apply to himself.

The Ink Blot (Rorschach Test) is the most frequently used projective test. A series of ink blots are shown to the client, one at a time. He is asked to look at each one and to tell what it might be. Specialists skilled in the use of this test claim they can obtain from it data that are very revealing of the individual's personality structure.

Among the numerous tests of a projective nature, puppets and dolls have been used with young children. One doll might represent the child's father; one, his mother; and one, his baby sister or brother. What he does with these dolls as he plays with them is revealing. If he sticks pins in the father doll or beats it, it could be suggestive of a certain relationship. How he plays with the baby sister or brother doll might reveal if sibling rivalry is present.

Drawings and paintings also can be very revealing when the "artist" is given the simple instruction to draw anything he would like to draw and, then, is permitted to express how he feels about it.

The subject or client might be asked to take a sentence-completion test in which he completes statements about his mother or father; his attitudes toward friends; his attitudes toward the past, the present, and the future; his fears, guilt feelings, and goals.

The following are examples:

I like my father but.....
I wish my mother.....
My parents treat me.....
My idea of a perfect mother.....
If I were a job foreman.....
I am afraid of.....
When I was young, I.....
The future looks.....
I had the secret ambition.....

From responses to such a test, some insight is gained into the client's emotional disturbance, especially if these data are used along with other data.

In addition to the interview, tests, and techniques already discussed, we have many tests of character "traits" (deceit, self-control, service, etc.), tests of attitudes (social, tolerance, scientific, etc.), interests, temperament, introversion-extroversion, submission-dominance, and values. In addition, some highly complex physiological, neurological, and chemical approaches to personality diagnosis have been developed.

The case history of a client often can shed a great deal of light on the causes of the problem under consideration. Obviously, not all problems require a case history for their understanding. However, where an emotional difficulty or conduct disorder has been building up over considerable time, the case history often can throw light on the origin of the difficulty or can confirm or question the tentative diagnosis made previous to the collection of these data. As with other devices and techniques, the case history is of no value in the hands of amateurs.

The so-called clinical method utilizes any or all of the aforementioned methods, as might be indicated in any given case; as might be limited by the inclinations and training of the specialist; or as might be limited by the conditions imposed by time, money, and the wishes of the client or his family.

Recreation: An Attitude of Mind

CARL E. WILLGOOSE
Associate Professor of Education
School of Education, Boston University
Boston, Massachusetts

THE ancient philosophers knew that the survival of man on this planet was related to his physiological and psychological well-being. Where the early Greeks spoke freely of mind-body relationships, the modern educator speaks of psychosomatic behavior. Reduced to its simplest terms, this means that man functions as a complete unit, and his very survival depends upon an optimum state of physical and mental health.

The Needs of Recreation

Through the years our society has become more demanding, challenging, and stimulating to most young people and adults. There are so many responses to be made to a wide variety of stimuli that the number of people failing to adjust satisfactorily is appalling.

Physicians, philosophers, sociologists, and educators have cried that something must be done. And, to a degree, something has been done. For one thing, people finally have begun to realize that the more complex civilization becomes, the less valid is instinctive behavior, and that, therefore, the greater becomes the need of education to preserve health. In addition, man has begun to do more than pay lip service to the oft-repeated objective, "worthy use of leisure time."

Recreation has been successfully stressed to such an extent that tens of thousands of people play bridge, take up golf, go bowling, swim, camp out, read good literature, play chess, ski, fish, and hike. They do these things in the name of recreation, but the startling and significant fact is that many of them do not truly recreate. True recreation is both physical and mental. It is rejuvenation at its best. It is linked with relaxation and diversion.

Play or amusement must be different from work to be worthy of pursuit during leisure hours. It must be rewarding in terms of relief from the problems and tensions of society. Recreational activity, to relate meaningfully to man's survival, must divert his attention and energy to something over which he can relax. For example, he may play hard at a game of softball or golf, but his attitude should be one of ease.

If man anxiously fights for perfection in his recreational activities, as he does in his work activities, his efforts will not produce relaxation and peace of mind. Rather, they will only produce more blood cholesterol for coronary disease, greater secretions for gastric ulcers, higher blood pressure for cerebral hemorrhage, and numerous frustrations leading to the doors of mental institutions.

Attitude Is Everything

Too many people, engaging in recreational and leisure-time activities, work as hard at their play as they would at

their given occupation. There is little true relief for the higher nerve centers, because the attitude of mind toward what is being done is not at all unlike the prevailing attitude any other time. Pent-up emotions need to be released; glands of internal secretion need to be rested from constant stimulation. It simply is not enough to divert one's attention from work to golf; one must do more. One also must divert his attitude.

Our world is full of situations which generate, in many men and women, a high degree of psychological stress, which is characterized by fear, anxiety, worry, apprehension, jealousy, hatred, and anger. If this state of stress persists, somatic changes take place. These changes may begin with gastro-intestinal upset, severe headaches, nausea, asthma, tacdacardia, restlessness, irritability, chronic fatigue, etc.

The man who is the perfectionist, with great concern for detail, or the aggressive driver, with a worrysome temperament, may need recreation and relaxation more than any other person in our society today. The business executive and the file clerk alike need to get away from the pressure of work. However, they will not gain the release they need if they feel great pressure or stress while engaging in a simple sport such as fishing or a game of cards. Only a changed attitude of mind toward the activity will relieve psychological stress. Activity must be pleasing, relaxing, and serene.

Recreation and Coronary Disease

It is interesting to read about the "before" and "after" behavior of persons with coronary heart disease. For purpose of illustration, one might note the recreational habits of President Eisenhower. It is somewhat common knowledge that the President, prior to his coronary illness, engaged in play with a vigorous concern for perfection. It might well be said that he was one of those people who "fights the game." He played as a man immediately concerned with his degree of skill and its perfection. He relentlessly attacked golf, fly-casting, bridge, and cooking in the manner of a man searching for flawlessness.

Newspaper accounts, references in *Time, Newsweek,* and *U. S. News and World Report* frequently pointed out that the President was anything but relaxed. Upon returning with a foursome from eighteen or twenty-four holes of golf, and being a little aggravated with his performance on the green, he very often practiced putting or chipping shots while his friends had refreshments. Then, when his companions had finished their refreshments, he often suggested that they tackle another nine holes of golf.

In addition, the President had been known to practice casting with his fishing line long after his fellow fishermen were prepared to leave for home. It seemed as though he were attempting to squeeze every last ounce of skill out of himself. To make things more stressful, he frequently showed evidence of being quite disturbed because of failure to perfect a particular skill.

With bridge the same attitude of mind prevailed. Indeed, many people who review bridge games to determine why they lost a particular trick are often drivers in the game; they are seldom relaxed in attitude or composure. Even when Mr. Eisenhower cooked fish for his Colorado colleagues during a hunting trip, he had been known to throw

out several pans of fish within the hour, because the fish were not fried exactly as he wanted them to be.

The foregoing example may seem unimportant to the casual observer, but it serves to indicate the *manner* in which recreational activity is engaged in. In short, there are two distinct kinds of play: one is relaxing and refreshing to body, mind, and spirit; the other is nothing more than a physical-emotional workout, leading to a state of increased psychological stress. As indicated by some of the leading specialists, the President's heart attack could have been related to the tension or stress syndrome.

Total fitness in society today is related to an environment wherein there is a minimum of stress; wherein man, exposed to more and more situations involving worry, fear, and anxiety, rises to meet the threat to his welfare by developing a positive attitude toward recreation. When physical activity is accomplished in this light, it becomes most effective, not only in terms of improved functional efficiency of the organism today, but also in terms of survival in the future.

In short, "It is not what you do, but the way you do it."

Educational Implications

No society, says Toynbee, has survived when a large amount of leisure time has become available. The job for educators is to prepare people for the leisure-time hours—not merely in a number of miscellaneous mental and physical activities, but with a sound outlook toward recreation in general. It is the outlook and appreciation that is significant, and it is not impossible to put this point of view across to pupils in secondary schools and colleges.

Schermerhorn Teachers' Agency
366 FIFTH AVENUE NEW YORK 1, N. Y. Phone: Wisconsin 7-9066
PHILIP C. GENTHNER, Prop.
Member National Association of Teachers' Agencies *A Superior Agency for Superior People*

TEACHERS NEEDED—Elementary—Secondary—College. We have officially listed, hundreds of splendid positions. Why not investigate these through us? Our many years of experience in placing teachers—**over 30 years under the same management**—give you expert guidance—so important in seeking a position. Write immediately. "You have everything to gain and nothing to lose."
GREAT AMERICAN TEACHERS AGENCY
Established 1880 Successor to THE PENN EDUCATIONAL BUREAU 80th Year
205 NORTH SEVENTH STREET, ALLENTOWN, PENNA.
Member National Association of Teachers' Agencies

Relation of Vision and Reading

SISTER M. BERNETTA ZIETZ, O. P.
Head of Department of Education, Aquinas College
Grand Rapids, Michigan

READING is the visual use of language. It is one of the most civilized arts man has invented and is a vast leap from objectivity to subjectivity.

We are aware that reading is more than the extension of a spoken word. "Reading is an elaborate arrangement of visual signs that must be organized in correct sequence with proper experiences to be aroused when the appropriate 'coded input' is instigated." (3) Reading is coded "input." Vision is "output." The relationship between reading and vision is intimate and tenuous.

There is a great variation among the purported incidence of reading-problem cases which are due primarily to visual difficulties. Nevertheless, the evaluation of vision and visual skills is of paramount importance in reading. Reading is, in the final analysis, a visual task plus. The poor reader must be helped to achieve the greatest degree of effective vision possible.

Dr. Charles B. Huelsman, Jr., Director of the Reading Clinic, Miami University, Oxford, Ohio, says, "Reading is a purposeful act by which sensations usually visual are perceived, understood, evaluated and reacted to according to the purposes of the reader." Visual perception has much the same definition. It is also a purposeful act by which sensations are perceived, placed in some logical array, and understood. Memory is brought into play, and meaning is attached to that which is perceived. It is in this area of perception that learning to read and learning to see appear to be almost parallel.

When applied to reading, the first step involves visual sensation, which is physical in nature. The second step in reading is chiefly dependent upon the experience and purposes of the reader and is primarily psychological in nature. Meaning, the resultant of abstraction from sensation, perception, and experience, is known as mental content. It varies from individual to individual and is proportionate to the quantity and quality of one's background and purpose.

Dr. Betts (1) suggests that we may view reading in at least four ways. First, reading is a language process rather than a subject. Second, in a psychological sense, reading is a thinking process. Third, in another sense, reading is a social process that relates the reader to his environment. Fourth, an adequate concept of the reading process embraces physiological factors, such as seeing and hearing. Of all these, Dr. Betts rightfully emphasizes the idea of evaluation or of reconstruction of ideas behind the symbols.

Visual Disability

The results of numerous research studies on visual difficulty in relation to the ability to read are of uncertain and conflicting etiological importance in reading difficulties. But, at the present

time, there is well-planned research being carried on by teams of educators, psychologists, and visual specialists in many areas. Among these areas are Ohio State University, Purdue University, University of Chicago, University of Florida, and Winter Haven, Florida.

The American Optometric Association and many state optometric associations are commendably active in this area. The yearly Visual Forum of the Illinois Optometric Association has done some fine work in this area of visual competence for learning by co-operative teams of educational specialists and vision specialists.

Dr. Pennington (7) writes, "While studies using various methods with different populations have not shown complete agreement they do suggest that hyperopia, binocular inco-ordination, hyperopic astigmation and aneseikonia may be detrimental in learning to read."

Visual Readiness

The farsightedness of children when they enter school is a fact overlooked by many teachers with bad effects on reading. "Many of the serious reading difficulties are directly traceable to retarded visual readiness." (8)

Reading readiness in its visual aspects starts very early in life. The skill of perceiving the difference between the child's parents is the same skill needed to perceive the difference between two similar letter combinations, which is common to words, places, or people (6).

According to recent research at the Franklin Hospital of San Francisco, "Retarded visual development may account for the failure of some children in learning to read. These youngsters of average or above-average intelligence appear to lack the ability to discriminate between words or other symbols." (2)

Perceptual Retardation

Dr. James C. Coleman (4) postulates that retardation in perceptual development is one important factor which enters into reading disability. Consequently, this group of reading-disability cases will be significantly inferior in the performance of perceptual tasks in comparison with a peer group which does not show reading disability.

A further trend which is indicated in the Coleman studies is that perceptual retardation is cumulative through the childhood age group. From this study, there is evidence that perceptual retardation plays a more significant role in reading disability of children than it does in reading disability of adults.

Overfocused Areas

Formal evidence on what conditions bring about a retardation in perceptual development is scanty, but there are certain clinical impressions, according to James C. Coleman, which may serve as helpful hints for further research.

1. Some children are seen to be too absorbed in some specific interest, e.g., airplanes, chemistry; they pay little attention to normal objects of interest in their own environment. Such an overfocused interest in one area might well lead to an unequal differentiation of the perceptual field which remains relatively unstructured or undifferentiated.

2. Frequently children are observed who have been negatively conditioned to areas of perceptual discrimination.

Dr. Marguerite Eberl and many other

visual specialists believe that some children never learn to focus properly, although they may have very good eyes structurally. Dr. Eberl (5) tells of a patient, a football player, from a family of "exceptional intellectual ability," who was being forced off the school team because of low grades. He had many regular eye examinations, and his vision was thought to be good. After giving him many tests for functional disorders, however, it was disclosed that the boy had been seeing double when he tried to read. Proper steps were taken, and his vision difficulties were corrected.

Importance of Accurate Vision

Quick, accurate seeing and good visual perception have great importance not only in reading, but also in all visual tasks. We are living in an age of "Look-See-Screen-Pic-Radar-TV," which puts a premium on quick, accurate visual perception. Many intellectual errors are not the fault of the intellect per se, but result from a faulty representation of stimuli. Quick, accurate perception, therefore, is a necessity for quick and accurate understanding.

Importance of Reading

Learning to read is a continuous process which is not necessarily completed at any given period in the life of the educated individual. Reading is the avenue to the University of Print; it is almost a universal medium in all written languages of the literate.

REFERENCES

1. Betts, Emmett A. *Foundations of Reading Instruction* (rev. ed.; New York: American Book Co., 1956).
2. Bing, Lois B. *Manual on the Visual Care of the Non-Achieving Child* (Minneapolis: American Optometric Association, 1956).
3. Broom, M. D. "Aspects of Reading," *Reading, Vision and the Optometrist*, Vol. 30, Ser. 11, No. 1 (October, 1957); Vol. 30, Ser. 11, No. 2 (November, 1957), p. 8.
4. Coleman, James C. "Perceptual Retardation in Reading Disability Cases," *Journal of Educational Psychology*, Vol. 44 (1953).
5. Eberl, Marguerite. "Visual Habits Important for Reading," *Catholic Telegraph Register*, July 27, 1956.
6. Getman, G. N., and Kephart, N. C. *The Perceptual Development of Retarded Children* (Lafayette, Ind.: Purdue University, 1956).
7. Pennington, L. A., and Berg, Irwin A. *An Introduction to Clinical Psychology* (New York: Ronald Press, 1948).
8. Wheeler, Lester. *Dealing with Visual Problems in the Classroom*, Publication No. 458, National Society for the Prevention of Blindness, Inc.

Many men of prominence, men exercising great power and influence, become adept at reading other persons. They become skilled in reading signs of happiness and unhappiness, security and insecurity, calmness and frustration, and other factors that affect personality and behavior. In most cases they build up this impressive technique entirely on their own through use of natural abilities. The whole structure of our society might well be changed if we could deliberately help individuals develop latent abilities of this type, which undoubtedly many of them possess.

—William H. Burton, *Reading in Child Development*

A Community Reading Center: Ten Years Later

WALTER B. BARBE
Director, Junior League Reading Center
University of Chattanooga, Chattanooga, Tennessee

THE past ten years have seen many changes in both the attitude of the general public and the support of reading instruction in the public schools. It has been a period filled with both bitter criticisms of the methods of teaching reading and bitter defenses of the *status quo*.

Memorable highlights of this decade are the appearance of Rudolph Flesch's book, *Why Johnny Can't Read,* and the appearance of the Russian satellite. Flesch's book brought forth criticisms of the way reading was being taught and demands for any kind of change. The contribution of this book, while probably not at all intended by its author, was to alert all of us to the need for a continuous evaluation of our methods of teaching reading. Where the critics of education drew attention to many of the educator's problems, Sputnik made the general public more sympathetic to the need for increased appropriations for education and for general community support.

Even before the days of Sputnik and *Why Johnny Can't Read,* Chattanooga, Tennessee, had established a community reading center. The Junior League of Chattanooga, recognizing the need for more attention to reading, brought together leaders in the community from the public schools, private schools, the University of Chattanooga, ophthalmologists, and other interested lay people. The general agreement was that not enough was being done for children who encountered difficulty in learning to read. Once the need was identified, the Junior League established, in 1949, a reading center dedicated to helping children with reading difficulties.

Beginning a Reading Center

For the next three years the Junior League of Chattanooga operated the Reading Center as an incorporated educational organization. The Center was operated by a board of advisors, with the full co-operation of all of the local schools. The staff of the Center was hired by the Junior League and paid from their community fund. Funds for operation of the Center were raised by means of a bargain mart, an annual rummage sale, and follies. The local newspaper printed a special edition which was sold in order to raise funds for the beginning of the Center. Contributions of materials and supplies came from many people. Volunteer League workers were scheduled at the Center regularly.

Fees were charged for both the diagnostic and remedial service. The amount of the fee was determined on the basis of the parents' ability to pay. The collection of such fees, however, provided

less than 10 per cent of the total budget of the Center.

Attempts to use League volunteers as teachers were not successful. It was found that there were many activities in which League members could assist at the Center other than in direct teaching activities. Many difficulties were encountered in obtaining a staff because of the lack of any school affiliation.

Change in Growth

After three years of operation by the Junior League, with an advisory board, it was decided to re-evaluate the entire Reading Center operation. A reading specialist from another community was brought to Chattanooga to evaluate the set-up and to make recommendations for a change. The reasons for the decision to have this evaluation made were as follows: the budget of the Reading Center constantly was increasing; only a limited number of children actually were being treated at the Reading Center; and difficulties were being encountered in the staffing of the Center.

Although the activities of the Center were praised, it was concluded that the center needed professional affiliation with existing educational organizations. The city and county school systems and the University of Chattanooga were the logical organizations. Therefore, it was decided that the Reading Center's operations be taken over by the University of Chattanooga, with assistance from the city and county schools.

The staff of the Reading Center was to be directed by a faculty member at the University of Chattanooga. The salary of this faculty member was to be paid from a chair of reading endowed by the Junior League of Chattanooga.

The county and city school systems were each to assign one teacher from their regular staffs to the Reading Center for a period of one year. During this time, these teachers were to receive training and to provide any service possible to the city and county children.

The contribution of each school system has developed now to two teachers, with the likelihood that more will be assigned in the future. Their appointments now are for two years.

While assigned to the Reading Center, the teachers are still part of the public-school system, receiving their pay from the school system and maintaining all of the benefits of any regular teacher.

The Director of the Reading Center selects the teachers from among those already employed by the city and county school system. This selection then is approved by the superintendents of the public-school systems.

Operation of the Center

In September, 1953, the University of Chattanooga began operation of the Junior League Reading Center. The staff consisted of a university faculty member, employed specifically to direct the Center, one teacher from the city school system, and one teacher from the county school system. The University provided housing for the Center, in return for which the director of the Center taught two university classes in methods of teaching reading. Each public-school system provided one teacher who received training and offered diagnostic and remedial service for the children of those school systems. The Junior League endowed a chair in reading at the University of Chattanooga guaranteed for a period of ten years.

It was decided that no fees would be charged public-school children. Any services offered to public-school children were to be considered a part of their regular program. They came to the Center during the school day and were not marked absent. The director and staff of the Reading Center were listed in the public-school directories as part of the public schools themselves.

Referrals were accepted only from classroom teachers, with the approval of their principal. Parental inquiries were referred first to the classroom teacher, who then made the arrangements with the Reading Center.

It was possible for any schoolchild to be referred by his classroom teacher to the Center for diagnostic testing. Whether or not he was accepted for remedial work depended upon the results of the diagnostic testing and conferences among the teacher, parent, and Reading Center staff. Neither I.Q. limitations nor restrictions as to the type child who should be referred to the Center were established. Basically, the philosophy has been that any classroom teacher who wanted help with a particular child could refer him to the Center.

Referral of first-grade children has been discouraged, although in no way prohibited. It is felt that first-grade children hardly will be classified as remedial until they have had more opportunity to discover whether or not they are going to learn to read. In many instances, referral has been made primarily to determine if there is a need for further referral. Numerous bright and gifted children also have been referred, not because they were behind in reading ability, but because they were in need of enrichment.

The schedule has been established with the majority of the testing being done on Mondays and remedial work being provided twice each week, either on Tuesdays and Thursdays, or Wednesdays and Fridays. The periods lasted from forty-five minutes to an hour, in most instances. Some children worked individually, while others worked in small groups. It has been found that the initial work was most successful individually, but, before the child returned to the regular classroom for instruction, he worked in a small group. The transition from small-group reading into regular classsroom seemed to make the gains obtained more permanent in the regular classroom situation.

Community Volunteers

Volunteer League workers provided many services which have aided in the operation of the Center. During the past ten years, about two hundred Junior League volunteers have given varying amounts of time in aiding the Reading Center to operate more effectively. In situations where transportation was otherwise unobtainable, League members have transported children. Clerical duties of all types have depended upon volunteer services. Those League members with specialized college training have aided in the diagnostic program, although no League members have been used as teachers.

A number of reading conferences have been held, with national leaders in the field of reading as speakers; these conferences have been planned and run entirely by Junior League workers. Once a year dinner has been held by the League for all teachers who have had children attending the Reading Center. This dinner usually was attended by

nearly a hundred teachers. The food was prepared and served by League members. On-going research of the Center has had the benefit of League volunteers who compiled data.

Perhaps the greatest service which the League has provided to the Center, in addition to the actual financial support of it, has been in the realm of public relations. Through their understanding of the need for the Center and operation of it, the volunteer workers have been able to interpret to the community the goals of the Center itself.

Expansion of Center Activities

The original name of the project was Junior League Reading Center. The reason for not establishing a remedial clinic alone lay in the basic philosophy of the project; i.e., the center's goal was much larger than mere correction of a small number of reading problems. By training teachers who would go back into the system, by offering reading conferences which would challenge teachers to do a more effective job of teaching reading, by making available diagnostic services, and by constantly offering a laboratory where new materials and techniques were demonstrated, it was believed that there would be fewer children who needed remedial work.

Operating within this broader interpretation of the duties of a reading clinic, the Center has worked in the schools themselves, establishing reading programs in order that fewer children would need remedial help. More teachers are being assigned to the Center from the school systems. More reading programs within the schools are being supervised by the staff of the Center.

Over the past ten years, more than ten thousand children have been tested at the Center, and nearly two thousand children have received remedial instruction by staff members.

In addition to the school-year program, a summer program, charging a small fee, has been developed. Results of the work, both in the winter and and summer, clearly have indicated that children can improve their reading.

The University has made more and more use of the Reading Center, both in offering classes for college students and in providing night classes in rapid reading. The college program began with one night class for adults; at the present time, there are five classes in operation. The Reading Center has been instrumental in establishing summer reading programs in Birmingham, Montgomery, and Cleveland, Tennessee.

Conclusion

The Junior League Reading Center of the University of Chattanooga stands as an example of what a community can do toward offering better educational opportunities for its children. Through the co-operation of the Junior League, the University, and the city and county school systems, the expense has not been prohibitive. A great many children have benefited from the pooling of these community resources.

Remedial Reading and Private Practice

WILLIAM C. DALY
Chief Psychologist, Orient State Institute
Orient, Ohio

WHEN a teacher, guidance counselor, or someone specialized in the field of remedial reading offers a diagnostic-and-remedial-reading service to private individuals, that person assumes full professional responsibility for this service and whatever it may entail. In accepting this responsibility the remedial-reading counselor should have not only skills necessary to the practice of his speciality, but also the ethical and professional attitude and philosophy demanded of those who provide a professional service to the public for a fee.

The process of diagnosing reading difficulties in children on a private basis and then planning and carrying out individualized programs of developmental or remedial reading affords a wide assortment of satisfactions for the counselor. On the other hand, many ticklish and disconcerting problems that sometimes seem to defy solution erupt intermittently.

While the former far outweighs the latter, much of the enjoyment and satisfaction one might derive from these tutorial experiences depends in large measure upon the tutorial predisposition and the basic attitudes of the person engaged in practice. These attitudes often determine the kinds of relationships that will grow out of the client-parent-counselor interchange.

Since problems arise in this kind of work as in any other professional or occupational pursuit, generally, the problems are resolved most effectively if the counselor handles them directly as they arise. He should strive to meet them as well as he can, to the optimum satisfaction of the child, the parents, and himself.

The intensity of these problems can be reduced by developing a consistent rationale, philosophy, and procedure which can embellish and add vitality to the counselor's relationship with both child and parents, from the time the youngster is first referred for diagnostic work until he completes his period of reading stimulation or tutoring. Even beyond this, it is important for the counselor to indicate his availability and willingness to help in case the need for some kind of follow-up service should occur.

This approach helps to sustain professional balance and organization in private practice and to develop in the child and parents a feeling of confidence in the counselor.

Medical Check Advised

Referrals can come from many sources. Some come from school teachers and school principals; others come from pediatricians, psychiatrists, general practitioners, and members of other

professional groups. Since physical and neurological examinations are always wise procedure, a referral from a medical doctor precludes this, reassuring the remedial-reading person that the youngster is in good health and ready for vigorous work to overcome his disability.

If a youngster has a hearing or vision problem, or some other physical handicap, imagined or real, the counselor needs to be apprised of this condition so that he may gear the program to the needs of the handicapped child. It is always a safe and sensible procedure to request that the child be checked by a physician, if this has been neglected.

Meeting the Parents

When the parents and child arrive for the first session, the counselor should discuss briefly with them the nature of the reading analysis in simple terms; the possible extent of the study which may include problem-solving, school achievement, and other areas of assessment; the amount of time the study may take; and the procedure that usually follows after the study has been completed. Some orientation in terms of the foregoing should help to relax and relieve the anxious parents.

Although rare, at this stage a parent may wish to know the cost of the service. Without hesitation, the counselor should state his fee in matter-of-fact terms. The counselor should be ready and able to manage such a situation, though it is the kind of situation some counselors consider embarrassing—an issue to be avoided, even evaded. In reality, there is no issue here, because the counselor provides a legitimate service for which a fee is due in proportion to his training and experience.

Reading Analysis Report

A diagnostic study usually takes somewhere from one to three hours depending on the child's mental development and attention span, the extent of analysis and study required, and the complications with which the counselor may be confronted during the study. The number of sittings normally vary from one to three, in accordance with the youngster's constitution and temperament and the counselor's consideration for him as a human being.

Subsequent to a diagnosis, a complete report, detailing the difficulties, should be sent to the pediatrician, psychiatrist, general practitioner, or referring agent. Most of the time, a comprehensive report is desired by the medical doctor—and rightly so. In light of the legal responsibility for his patient's welfare, the physician expects to receive results of the study so that he may follow through and assist the parents in making a decision.

At this point, the physician usually recommends to the child's parents that the child needs and should have special tutoring or that the child can get along without reading stimulation, depending on the outcomes of the study and the physician's knowledge of the youngster. Should the alternative be special tutoring, the parents then would contact the counselor for the purpose of obtaining remedial-reading assistance.

No Predictions, Please

Parents naturally want to know how long it will take their child to learn to read as other children, to read on a level equal to most other youngsters in the same age group. This presumes an in-

tangible, supernatural ability to predict on the part of the counselor. Counselors do not have this ability and should not presume to have it. A simple factual statement or two, explaining that prediction is not possible, that it is beyond the human capacity of the counselor, that many interrelated factors enter the total picture, and that some youngsters spurt ahead in reading with special attention, guidance, and instruction after fifty-five hours, while others with similar disabilities might increase their reading speed to the same degree after only fifteen hours.

Since the land of prediction is laden with quicksand and controversy, parents should be informed that the answer to the question of improvement and progress will have to be determined along the way through means of periodic re-evaluations to measure reading changes. If the parents are familiar with the factual probabilities of progress and the accompanying complications of the remedial-reading process, beforehand, fewer problems and queries will haunt the counselor later on.

Causes ?

Many parents persistently ask about causation. They want to know what brought on their child's reading difficulty. This is a challenging question, indeed, a question which, more often than not, cannot be answered with any definitiveness or preciseness. The answer could encompass any combination or complex of factors in the youngster's home and school experiences in conjunction with a maze of personality-intellectual components which do not lend themselves to easy analysis.

If no obvious causes can be found, the counselor may comfort the parents by casually discussing some of the combinations of causative factors. He may initiate this catharsis device through the nondirective technique of asking the parents specific questions related to possible causes: number of schools attended; size of classes; lack of reading readiness; poor motivation; inadequate basic skills; ineffectual teaching; and absences through sickness.

Underlying these causes, however, is one significant cause. This cause involves the highly complex abilities which are not easily detected or observed in the reading process (2).

When Should Tutoring End?

Another problem is deciding when to terminate tutoring. Most parents leave this matter entirely in the hands of the counselor. They would rather have him say dogmatically: "The child should continue"; "He has improved sufficiently"; "He can get along independently now"; or "He does not need tutoring." These statements cannot and should not be made.

If, after the youngster has had, let us say, fifteen hours of remedial work, his reading has improved so that now, as an early third grader, he is reading on a middle-second-grade level, the current evaluation should be presented and discussed with the parents.

The question of continuing remediation should be resolved through a number of avenues: one, the current reading evaluation; two, the observation and assessment of the counselor; and three, the evaluation and judgement of the school teacher who has been observing the youngster in relation to the group and in relation to the reading abilities

of the individual pupils within the group.

All of these facets should be reviewed before a decision is reached. Parents can decide better on a course of action if they are given data from the aforementioned sources and if they are permitted to assimilate that data. The writer feels the teacher's evaluation and opinion should carry considerable weight and should influence strongly the final decision, because the ultimate goal is the comfortable and happy adjustment of the child in the school group. If anyone can provide enlightenment here, it is the teacher.

Everyone Is Involved

Remedial-reading counselors should realize that private professional activity transcends the child-counselor relationship and moves into other complex relationships dealing with teachers, parents, and doctors. The "total push" concept in mental health should be applied in the private practice of helping retarded readers and children with reading disabilities.

Although the counselor and his remedial reading procedure are essential, parents and teachers definitely enter the treatment picture in a positive way. In turn, they can contribute valuable assistance by providing light reading stimulation at the child's current level of reading; by reducing the pressure on the youngster to read at a level equal to his chronological-age group; and by supplying additional support and encouragement for the youngster whose handicap, to him, is intolerable.

The counselor in private practice offers a needed service which can supplement the work of the fatigued, and sometimes overstimulated, teacher in our schools. A private service for children with particularly troublesome reading difficulties can be a great asset to parents, teachers, and physicians, who presently have few resources to which they can turn.

REFERENCES

1. Rabinovitch, Ralph D. "Reading and Learning Disabilities," *American Handbook of Psychiatry*, ed. Silvano Arieti (New York: Basic Books, Inc., 1959), pp. 857-869.
2. Gates, Arthur I. *The Improvement of Reading: A Program of Diagnostic and Remedial Methods* (3rd ed.; New York: The Macmillan Company, 1947).

SOUTHERN TEACHERS' AGENCY
of Richmond, Va.
Prompt and efficient service to teachers and administrators.
213 Broad-Grace Arcade — Telephone MI 3-6314
Member N. A. T. A.
C. D. GUESS SUSAN F. GUESS FRANK HURLEY

TEACHERS PLACEMENT SERVICE
Nation-Wide
We shall have many unfilled vacancies all through September. These are in the better schools requiring well-qualified teachers.
No registration fee. *NO OBLIGATION UNTIL ACCEPTANCE OF A POSITION.*
1950 LeVeque-Lincoln Tower **Vernon M. Riegel, Manager**
Columbus 15, Ohio **Phone: CApital 4-2882**

Let's Challenge the Gifted Students

ELEANOR M. JOHNSON
Director, Elementary School Services and Publications
Wesleyan University, Middletown, Connecticut

"MEN are unequal in their native capacities, their motivations, and therefore in their attainments."[1]

It took a ballistic missile to awaken the American people to a realization that the most underprivileged and undereducated group of students in America is the gifted and talented. The waste of talent in American schools is deplorable.

It is unquestionably true that we have worried all too little about our more able students. We have devoted time and money to the education of the average pupils and, more recently, to special education for slower pupils and handicapped youngsters. However, it will serve no purpose to replace neglect of the gifted by neglect of the average. Concern for the gifted does not mean contempt for the less able. We must educate everyone to the level of *his* ability. A democracy must foster excellence if it is to survive.

A system must be devised to keep all individuals learning at close to their maximum speed and to avoid any tendency to slow the faster pupils. We cannot afford to waste our valuable brain power, which we so desperately need for the successful functioning of our democratic system.

Schools now are charged with the responsibility for developing new curricula and teaching methods which will give the gifted pupils educational opportunities at least comparable with those of other students. Perhaps more is being done on the high-school level at present than on the elementary level.

The problem of caring for the more able pupils in the elementary school still depends largely on enrichment activities carried on in the regular classroom. The classroom teacher can:

1. *Challenge the pupils' real abilities.* Gifted students need to enjoy the excitement of intellectual achievement. They must go deeper, not merely faster.
2. *Enrich their reading.* The teacher can guide and encourage these superior pupils to read widely in many fields; to increase their rate of reading; to perfect study and library skills; and to gain proficiency in critical interpretation.
3. *Study their interests and problems.*
4. *Encourage creative expression on every higher level of attainment.*
5. *Make assignments on three levels of difficulty.* Then, each student may select his own level of achievement. Many students are capable of doing more advanced work than they are ever given the opportunity to do. Nothing gives a student more pleasure than climbing a mountain that he wasn't sure he could climb.
6. *Organize science and math clubs which meet on Saturdays for advanced work.* We must not let potential talents

1. *The Pursuit of Excellence: Education and the Future of America* (New York: Doubleday and Co., 1958).

atrophy for lack of imaginative guidance and direction.[2]

Criteria for Experiences

Activities which challenge the more able learners must meet certain criteria such as the following:

1. *Breadth and Depth.* Gifted pupils can go deeper and can contribute additional materials to the class. We also need to allow for exploration of problems of the pupils' own choosing, problems which may or may not be connected with regular classwork.
2. *Creativity.* The school can offer opportunities for creativeness in language arts and crafts beyond the average pupil's ability.
3. *Initiative.* We can encourage more able pupils to investigate additional sources of information beyond the grade-level expectation.
4. *Leadership.* We can provide opportunities for pupils to develop leadership capacities.

Critical Thinking

The unusual ability of gifted pupils to think critically, to build meanings and concepts, and to establish relationships should be cultivated.

For too long, we have tried to force students to conform to the thinking of the group (group consensus) at the sacrifice of their own individualities. We do not need a generation of conformists. Rather, we need a generation of men and women who are able and willing to think independently. Independent thinking is not incompatible with effective teamwork; it is essential to it.

For example, think of the changes that have been wrought in the past seventy-five years. Think of the minds (individual and group) which have brought them to pass. In the span of a lifetime, creative minds have produced electric locomotives, movies, submarines, X-rays, airplanes, radio and television, radium, and nuclear processes, to mention just a few advancements.

But this is only the beginning! What changes will come in the next twenty-five or fifty years? Here is a challenge to every teacher who has it in his power to train and stimulate youth to do creative thinking. Our youth can be encouraged to let their minds roam down adventurous paths, trodden and untrodden, which lead, literally and figuratively, to the stars. Every day, every teacher from kindergarten through college can and should train students to do independent creative thinking.

Schools have done more toward identifying levels of talent than they have toward developing different programs for these different levels. We must reappraise the traditional views in regard to acceleration. We must re-evaluate homogeneous-grouping practices. We must offer more than lip service to the enrichment of the curriculum.

Moreover, we must rid ourselves of the idea that ability sections and courses, enrichment, acceleration, or other curricular arrangements are undemocratic. If we are serious about individual differences, we must be serious about equality of opportunity. We must view democracy not as an invitation to share a common mediocrity, but as a system "that allows each to live up to the special excellence that is in him."

2. The reader is referred to the special section on the Gifted in the *NEA Journal*, Vol. 47, No. 7 (October, 1958), pp. 470-481.

Aviation Education Moves Ahead

EVAN EVANS
Executive Secretary, National Aviation Education Council
Washington, D. C.

ONE of the greatest impetuses in aviation education came from the Civil Aeronautics Administration (or CAA) when, under the inspired leadership of men such as Dr. H. E. Mehrens, the entire country was covered with enthusiasts, activities, and materials. When the CAA discontinued this program, Dr. Mehrens moved over to the Civil Air Patrol (CAP), where he was the author of several CAP books.

In recent transfers of personnel of the Civil Air Patrol, and in the transfer of CAP headquarters from Washington to Ellington Air Force Base, Texas, Dr. Mehrens moved to the Department of Health, Education and Welfare. Dr. Mervin K. Strickler, who was Aviation Educationist for CAP transferred to the Federal Aviation Agency (FAA).

The FAA has not given specific attention to aviation education since reorganization. However, now that Dr. Strickler, nationally recognized leader in the aviation-education field, has been assigned to organize the program, it is anticipated that new services on the governmental-agency level will be available to teachers, administrators, and boys and girls.

Agencies already active in the field of aviation education include:

1. The Civil Air Patrol, which now has Mr. Charles Webb as its aviation-education specialist.

2. The National Aviation Education Council, which continues to expand both its services and its available materials.

3. The Aerospace Education Foundation of the Air Force Association, which works closely with state superintendents and other federal and state agencies. The Foundation is directed by Dr. Frank Sorenson of the University of Nebraska.

4. The Link Foundation, also directed by Dr. Sorenson, which continues to make funds available for experimental, exploratory, and graduate work in the field of aviation education.

5. The U. S. Office of Education, which employs Mr. Willis C. Brown as Specialist of Aerospace Education.

6. A few of the airlines, which employ specialists in the field to provide active services. Notable among the airlines are: United Air Lines, with Mr. Ray Mertes; Pan American World Airways, with Mr. George Gardener; and Trans-World Airlines, with Dr. John Furbay.

7. Commissions, councils, or committees in the several states, which are providing effective and serviceable programs. Among the state organizations that are outstanding are those in California, Massachusetts, Iowa, Kansas, and Ohio.

One of the states that has done the most in the field of aviation education is Ohio, where there is a very active program in conjunction with the Ohio Academy of Science and other teacher

and science organizations within the state.

Ohio, too, started the program of taking members of the Future Farmers of America up into the air so that they could see conservation practices on their own and other farms. In fact, Ohio pioneered this area of co-operation among aviation, industry, and agriculture.

8. The National Association of State Aviation Officials, whose members have taken a new and enthusiastic interest in aviation education. In the main, these officials are drawing upon the National Aviation Education Council for materials and services; nevertheless, they co-operate wherever possible with any agency working in the field.

9. The National Aeronautic Association, which, through the inspiring genius of its president, Miss Jacquelin Cochran, is offering splendid leadership in the field. The NAA acts as the center wheel, the driving force, and the financial assistant to its associates and affiliates, several of which are specifically interested in aviation education.

The Academy of Model Aeronautics, an affiliate, and the National Aviation Education Council, an associate, are supported in part by NAA.

10. Federation Aeronautique Internationale (FAI), which has an international responsibility. Miss Cochran is also President of this organization, and she has encouraged the international commission on aviation education, an adjunct of the FAI.

DO YOU ENJOY EDUCATION MAGAZINE?

Chances are you do, or you wouldn't be reading this. And, chances are that many of your associates would also enjoy receiving their own copy of EDUCATION each month.

To help acquaint new readers with the practical and thought-provoking articles and editorial material appearing each month in EDUCATION, we will be happy to send FREE sample copies to any of your associates you think would enjoy receiving them—with *your* compliments!

Simply list their names and addresses below and mail at your convenience; on receipt, a sample copy of the current issue will be sent immediately.

Name .....
Title .....
Affiliation .....
Address .....
City ..... Zone .... State .....

Name .....
Title .....
Affiliation .....
Address .....
City ..... Zone .... State .....

Name .....
Title .....
Affiliation .....
Address .....
City ..... Zone .... State .....

MY NAME IS: .....
MY ADDRESS IS: .....

Mail to: Circulation Dept.,
EDUCATION,
1720 E. 38th St.,
Indianapolis 6, Indiana

Leaders in Education XXVII

JAMES R. KILLIAN, Jr.

DR. JAMES R. KILLIAN, JR. became Chairman of the Corporation of the Massachusetts Institute of Technology on January 1, 1959, after nearly thirty-five years' affiliation with the Institute.

Dr. Killian was born in Blacksburg, South Carolina on July 24, 1904. After attending the McCallie School in Chattanooga, he studied at Trinity College (now Duke University) from 1921 to 1923. Then he transferred to M.I.T. and graduated in 1926 with a Bachelor of Science degree.

Upon graduation, James Killian remained at the Institute, serving successively as editor of "The Technology Review"; assistant to the president; executive vice-president; and vice-president. He became president of M.I.T. in April, 1949, at the age of forty-five.

The period of Dr. Killian's administration was marked by great expansion of the Institute, resulting in increased responsibility for defense research and more emphasis on the humanities and social sciences in the education of scientists and engineers.

Dr. Killian has consistently supported changes to balance the Institute's professional curriculum with such courses and activities as would provide the graduate with greater depth as well as greater breadth. During his administration, M.I.T. established a School of Humanities and Social Studies, a School of Industrial Management, and The Center for International Studies.

The scope of Dr. Killian's activities and achievements is so vast that space will not permit a recounting of them. A few examples will suffice.

Dr. Killian served as Special Assistant for Science and Technology to President Eisenhower from November, 1957 to July, 1959. At present, he is a member of the President's Commission on National Goals.

Among the countless honors bestowed upon this distinguished leader in education are honorary doctorate degrees from thirty colleges and universities, as well as numerous awards and citations, commending him for his contributions to science, education, and humanity.

WHAT SCHOOLS ARE DOING

Individualizing Instruction

GUY WAGNER
Director of the Curriculum Laboratory
Iowa State Teachers College, Cedar Falls

WHAT is meant by individualized instruction? In one sense, it may be considered as the direct opposite of classwork in which every member is expected to be doing the same thing at the same time and in the same way, regardless of individual differences, in talent, achievement, and interests.

From a more positive viewpoint, individualized instruction may well be called "personalized instruction," inasmuch as guidance and planning are geared to the needs and learning patterns of each individual pupil. Thus, the experiences of each pupil are related to his present abilities and needs.

Generally speaking, individualizing instruction means:

1. Providing a rich classroom environment which reflects a variety of interests (and achievement levels).
2. Turning classrooms into laboratories for learning.
3. Maintaining an environment of books which makes possible reading from a wide variety of sources and on a wider range of reading levels.
4. Engaging in teacher-pupil planning.
5. Providing a reasonable amount of group instruction on problems of common interest—especially in explaining a new process.
6. Varying the amount and type of drill provided children on the various levels.
7. Providing oportunities for independent work.
8. Employing a substantial amount of small-group work.
9. Utilizing special laboratories for individual and group remedial teaching.
10. Differentiating assignments, whether pupil selected or teacher made.

References containing good suggestions for personalizing instructions are:

Baltimore County Public Schools. *A Guide to the Reading Program.* Board of Education of Baltimore County, Towson, Md., 1959.

Betts, Emmett Albert. "Approaches to Differentiated Guidance in Reading," *Education,* Vol. 70, No. 9 (May, 1950), pp. 582-599.

Betts, Emmett Albert. "Reading Abilities: Averages and Deviations," *Education,* Vol. 74, No. 5 (January, 1954), pp. 323-326.

Cutts, Norma E., and Moseley, Nicholas. *Providing for Individualized Differences in the Elementary School* (Englewood Cliffs, N. J.: Prentice-Hall, Inc., 1960).

Modesto City and Stanislaus County. *The English Language Arts—Secondary School Guide.* Modesto, Calif., 1960.

Tacoma Public Schools, *Planning a Reading Program Adjusted to Individual Needs.* Tacoma, Washington, 1955.

Veatch, Jeannette. "Individualized Reading—For Success in the Classroom," *The Educational Trend* (New London, Conn.: Arthur C. Croft Publications, 1954).

VIEWPOINTS

What Does the World Need? (Part I)

EARL H. HANSON
Superintendent of Schools, Rock Island, Illinois

ALL over the world, people are beginning to suspect that their ancient faiths, verbalized into creeds, are myths. So far, there is not clear acceptance of a new creed. Instead, millions upon millions are weighing two creeds. Perhaps they are doing it subconsciously; nonetheless, they are doing it just the same.

One creed is brutally materialistic on the surface. It draws its nourishment from an almost spiritual conviction that man, as an individual, is not sacred. Rather, his divinity, if there be a divinity, rests entirely with society.

The other creed is our own. It believes that every man is sacredly important. Our creed is simply expressed in the Declaration of Independence, which says, "All men are created equal." This clause has its roots in Genesis, which says, "And God created man in His own image."

These two great rocks of faith are rubbing against each other, almost in the same fashion as the great deeps of rock along our western coast, cracked by fault, rub against each other. This geologic fault causes earthquakes out West. My wife and I were in an earthquake last summer, while we were vacationing in Yellowstone Park. Today, we are faced with a possible "earthquake" among the peoples of the world.

In the past, when there has been a sociological or religious fault, like a geological one, the world always has moved into a new age or era. Each time there has been such a change, one human characteristic seems to have been dominant.

In the move into the Dark Ages, this characteristic was brutality, the opposite of gentleness. In the age of exploration, it was adventuresomeness, the opposite of timidity. In the dawning of the age of science, what was most needed was respect for intelligence, the opposite of anti-intellectualism.

The next change can be either malign or benign. Many people gloomily expect that it will be malign. They have become so passive about the matter that they react as a bird hypnotized by a snake. They moan and creep toward caves, because the lights of the world are about to be blown out.

What human tendency is most needed to make the next change benign, rather than malign? I am convinced that it is not more respect for brains—important as they are—but love. Remember, brains can be tied to an insane personality. Brainy men can be manipulated by crazy men. Remember Hitler and the German scientists!

Next month, this column will explore that possibility.

The Bulletin Board

The Boston University School of Nursing announced this past summer that it had established a Doctor of Nursing Science degree, the first doctorate in the county which specifically identifies nursing in the degree title. The first doctoral offering is in psychiatric nursing. Programs in other clinical areas will be instituted in the next two to four years.

The Education Council of the Graphic Arts Industry will conduct its Printing and Publishing Industry National Scholarship competition during the coming school year. The National Scholarship Trust Fund of the Council will award a minimum of five four-year scholarships with grants ranging up to a maximum of $1000 per year, to begin in September, 1961. During the present school year, twenty-eight college students are studying in the fields of printing management, teaching, and design under scholarship grants totaling over $20,000. Information concerning the scholarship competition may be obtained from the Council, located at 5728 Connecticut Avenue, N.W., Washington 15, D. C.

In action taken at its annual conference in Los Angeles, June 30, 1960, the National Education Association voted departmental status to the American Association of School Librarians. The A. A. S. L. will continue its status as a division of the American Library Association, with headquarters in Chicago.

Beginning October 3, 1960, the National Geographic Society will launch its thirty-ninth year of publishing the weekly *Geographic School Bulletins*. As in the past, the *Bulletins* will report on the world and its life, presenting scores of illustrated articles designed to give depth and meaning to world events.

The Materials of Instruction Committee of the National Aviation Education Council has announced the publication of the third edition of "Pictures, Pamphlets, and Packets," a booklet listing sources of free and inexpensive air/space age teaching aids.

Following its traditional pattern of holding regional conventions every third year, the American Association of School Administrators has announced preliminary plans for the 1961 meetings to be held in San Francisco, Feb. 25-28, St. Louis, March 11-14, and Philadelphia, March 25-28.

Something new will be added this year, reports AASA Executive Secretary Finis E. Engleman, in that the program will depart from formats of the past. At four of the seven general sessions during the regional meetings, speaker-analyst teams will explore disciplines related to education, each member of a team looking at a particular discipline from a different side of the coin.

AASA President Forrest E. Conner, superintendent of schools, St. Paul, Minn., has chosen the following topics for presentation: mental health, economics, political science and government, and social anthropology. Each speaker, a recognized authority in his profession, will highlight the most recent developments in his field without comment on the implications for education. The analyst, a school administrator, taking his cue from preceding remarks, will then explore the implications of those developments for education.

Another of the general sessions will give high priority to the international scene. Four educators from other nations, representing the United Kingdom, the Arab-speaking world, central Europe, and the Orient, will tell AASA members about progress being made in their countries in the field of education.

Large sectional meetings will be held twice during each of the conventions: on Sunday afternoon and on Monday morning. The AASA Architectural Exhibit, as well as the educational exhibits, will be shown in each of the three cities. The 1961 resolutions and the four proposed amendments to the AASA Constitution and AASA Bylaws will be presented for voting by members attending each convention. The annual open business meeting of the Association will be held in St. Louis, where reports from the Resolutions Committee, the Audit Committee, and the Board of Tellers will be read for approval.

BOOK REVIEWS

WILLIAM P. SEARS, JR., Book Review Editor
New York University School of Education
Washington Square, New York City

FIVES AT SCHOOL. By Elenora Haegele Moore. New York, N. Y. Putnam's. 1959. $4.75.

Attention is focused on only one year of a child's life in this book which treats of the goals and methods of kindergarten education. The similarities and differences between home life and kindergarten for both surburban and city five-year-olds are identified. Emphasis is placed on psychological and sociological factors which affect child growth and development. The volume will serve a useful purpose in the initial and the in-service education of kindergartners.—W. P. S.

THE FIFTH MENTAL MEASUREMENTS YEARBOOK. Edited by Oscar Krisen Buros. Highland Park, N. J. The Gryphon Press. 1959. $22.50.

It is rather late in the day to call attention to the *Mental Measurement Yearbook*. Workers in the various fields of education know it well and realize that they cannot be without it. This is true for research workers, experimenters, and counselors.—W. P. S.

10,000 CAREERS. By Robert L. Thorndike and Elizabeth Hagen. New York, N. Y. Wiley. 1959. $8.50.

The substance of this important study is the analysis of aptitude scores of some 17,000 men who were tested in 1943 in relation to their later careers as examined in 1955 and 1956. The authors discovered the kind of work each man is now doing and attempted to estimate the measure of success he was having on the job. This information was then considered in relation to the aptitude scores of more than a decade ago.

—W. P. S.

PUBLIC SCHOOL FINANCE. By Paul R. Mort, Walter C. Reusser, and John W. Polley. New York, N. Y. McGraw-Hill. 1960. $7.50.

"Mort, Reusser and Polley" has for years been regarded as an excellent text in school finance. It has been used effectively by professors of school administration and studied to good advantage by those whose professional duties lie in the realm of school fiscal matters. The book, now in its third edition, is a timely 1960 text.—W. P. S.

PSYCHOLOGY OF MUSIC. By Carl E. Seashore. New York, N. Y. McGraw-Hill. 1959. $2.95.

Dr. Seashore's famous study of music from a psychological point of view is available now in a paperback edition for a fraction of its original cost. The book is nothing short of a classic in its field.—W. P. S.

A HISTORY OF ART. By Germain Bazin. Boston, Mass. Houghton Mifflin. 1959. $9.00.

This is a survey of man's achievements in painting, sculpture, and architecture from prehistoric times to the present. Some six hundred and fifty illustrations, many in full color, add to the value of the text. Mr. Bazin is equally at home in such widely differing periods of art history as the prehistoric, the medieval, and the contemporary. He deals equally well, too ,with sculpture and achitecture as well as painting. There are succinct and brilliant introductions to each of the great epochs and stimulating remarks on individual artists. The book will be an excellent reference for teachers and may serve as a text in college courses in art appreciation and the history of art.—W. P. S.

HELPS FOR ENGLISH AND ARITHMETIC TEACHERS

The Eaton Book Report System requires more thinking and less writing on the part of the student and less reading and correcting on the part of the teacher. It also provides a handy, permanent record of each student's outside reading. Form A for Novels and Drama, Form B for Essays and Short Stories, Form C for the Book Review, Form D for the Photoplay Review, Form E for Biography, Form F for Travel. Prices: $2.00 per hundred. Permanent Record Cards, $2.00 per 100.

Eaton-Palmer Workbooks in Literature: Macbeth, Julius Caesar, Ivanhoe, Treasure Island, A Tale of Two Cities, Silas Marner, The Lady of the Lake, Idylls of the King, The Merchant of Venice, Hamlet. Hundreds of thousands of copies sold all over the country. Try them out in one class and you will want more. Single copies 25 cents, with key 40 cents. Discount on class orders.

Pictorial Literature Maps: Interesting visual aids for your literature classes. Each map is loaded with interesting information. English Literature Map in black and white, $1.25. Map of American Literature, in colors, $1.75.

Workbook in Basic Spelling. This is a scientifically worked out method of really eliminating errors most frequently made in basic spelling at the junior high school level. It is also useful with struggling spellers in higher grades. Price $.50 a copy. Ten percent discount on class orders.

Eaton Literature Tests: Thirty-eight popular titles used in junior and senior high schools. Write for a complete list. 5 cents each or $4.50 per hundred, any assortment.

Staff Handbook for the High School Newspaper: If you are supervising the publication of a school paper, you will welcome this little book. Price 35 cents. Ten percent discount for class orders of ten or more copies.

Kingsley Outline Studies in Literature. Excellent guides for those who want to make a careful study of the classics. Seventy separate titles. Write for a complete list. Single copy 50 cents postpaid. Two or more, 35 cents each. Class orders, ten or more, 25 cents each.

Wilson Teaching Tests in Arithmetic: Inventory and diagnostic tests, covering the fundamental processes that make up 90% of ordinary adult figuring. Cost is nominal, $2.50 per hundred.

THE RIDGE MANOR PUBLISHING COMPANY

Distributors of The Palmer Company publications

RIDGE MANOR FLORIDA

ANNOUNCING . . . The Newest and Best in Supplementary Reading

Bobbs-Merrill BEST OF CHILDREN'S LITERATURE

Compiled and Edited by Nila Banton Smith, Hazel C. Hart and Clara Belle Baker

The One Supplementary Reading Series That *Strengthens* The Total Reading Program!

• BEST OF CHILDREN'S LITERATURE is a fresh, new collection of favorite stories and poems that will give new vitality and real strength to your total reading program. Here are excitingly beautiful and versatile books that will encourage even poor readers — stimulate all pupils to read more.

SUNNY AND GAY for Grade 1
FOOLISH AND WISE for Grade 2
FUN ALL AROUND for Grade 3
SHINING HOURS for Grade 4
TIME FOR ADVENTURE for Grade 5
BEYOND THE HORIZON for Grade 6

• BEST OF CHILDREN'S LITERATURE brings together favorites of all time to provide real enjoyment and reading success for every pupil. Check these important features:

- **Best-balanced selection** of children's favorites
- **Most distinguished collection** from all over the world
- **Magnificently illustrated** — in color
- Organized around natural **centers of pupil interest**
- **Reinforces** the reading program — **Enriches** the total curriculum
- **FREE Instructional Tests** in Literature Appreciation
- **Versatile** — for teacher directed or independent reading
- **Easy-to-use Teacher's Manuals** give step-by-step guidance

FREE BOOKLETS of sample selections are yours for examination. Each booklet contains the Table of Contents, listing all stories and poems, and a selected sample page from each unit for one grade from the exciting new BOBBS-MERRILL BEST OF CHILDREN'S LITERATURE. Get these booklets and see for yourself how BEST OF CHILDREN'S LITERATURE will inspire improved reading in your classes.

The Supplementary Readers That *Really* Complement Your Total Reading Program!

Return This Coupon - Now!

The Bobbs-Merrill Co., Inc. Dept. E
1720 E. 38th St., Indianapolis 6, Ind.

Yes, please send me FREE booklets of selected sample pages from BOBBS-MERRILL BEST OF CHILDRENS' LITERATURE for the grades circled below:

1 2 3 4 5 6 (circle grades)

Name.....

School or Title.....

Street.....

City.....Zone.....State.....